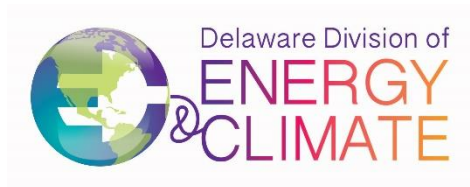
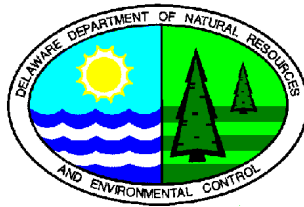




Delaware Weatherization Assistance Program Manual

**Delaware Department of Natural Resources and
Environmental Control**



Weatherization Assistance Program

January 2017

ACKNOWLEDGEMENT

This Manual was prepared by the staff of the Delaware Weatherization Assistance Program. In addition, the manual is heavily influenced by the good work of dozens of contractors and previous weatherization professionals in Delaware and around the country,

THIS MANUAL CONTAINS THE ENTIRE BODY OF THE DELAWARE WEATHERIZATION ASSISTANCE PROGRAM RULES, POLICIES AND PROCEDURES. IT IS DESIGNED AS A RESOURCE FOR THE STATE, ITS WAP SUBGRANTEES, THE STAFF AND CONTRACTORS WORKING IN THE PROGRAM AND ULTIMATELY FOR THE WAP CLIENTS WE SERVE. IT IS ALSO AN EVERGREEN DOCUMENT, AND WILL CHANGE WITH REFINED POLICIES AND PROCEDURES, REGULAR PROGRAM UPDATES, TECHNICAL ADVANCES AND FIELD EXPERIENCE.

Section 3 of this Manual is identified as the Delaware WAP Field Guide, the body of knowledge and requirements for WAP professionals in the field. The Field Guide has incorporated all of the revisions to the Standard Work Specifications which were approved by the Department of Energy (DOE) in December 2014. Besides being included in the WAP Manual, the Field Guide is provided to the field professionals as a stand-alone guide. The Standard Work Specifications are provided to the Subgrantee and all of the WAP contractors. In addition they are located on the DNREC Dropbox account and available digitally.

While field professionals need to be most familiar with the Standard Work Specifications and Delaware Field Guide, a comprehensive understanding of the entire Manual is recommended for everyone working in the program.

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1. INTRODUCTION

The provision of weatherization services requires collaboration at all agency levels, federal, state, and local, to effectively lessen the energy burden of low-income families, improve their environmental quality and help them maintain a healthy and a safe home. This manual is intended as a comprehensive guide to the joint administration and implementation of services. Its purpose is to ensure compliance consistent with the all applicable regulations, while providing a framework for the implementation of reasonable and effective weatherization measures.

The Delaware Weatherization Assistance Program (WAP) Manual provides a comprehensive resource for all rules, policies and procedures for implementation of the program at all levels. It is the sole source for all administrative and technical documents associated with the program, including all field guides and standard work specifications for work being conducted under this program. Portions of this manual serve various singular purposes such as the required Health and Safety Plan, Appendix B, submitted with the Delaware Weatherization grant, the Field Guide, and Standard Work Specifications which are used by weatherization professionals in the field.

This Manual is intended as a dynamic document for the repository of all program policies and procedures, and will be revised yearly to align with the federal PY.

The US Department of Energy (DOE) administers the federal Weatherization Assistance Program (WAP). The federal regulations over the program are contained in 10 CFR, Part 440, “Weatherization Assistance for Low-income Persons”. Further relevant regulations are in 2 CFR Part 200, *Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards* which contains the regulations for the administration of all DOE grants including weatherization. Additional DOE guidance documents are available online at: <http://www.waptac.org/Rules-0024amp;-Guidance/Program-Guidance.aspx>.

The “Grantee” for the State of Delaware under 10 CFR 440 is the Department of Natural Resources and Environmental Control (DNREC), which has placed the grant administration in its Division of Energy and Climate (DEC). The DEC includes DNREC’s key energy and climate policy staff who implement extensive energy efficiency programs, renewable energy programs, climate mitigation and adaptation work and the States Sustainable planning initiative. Placing the WAP in DEC works to maintain the high level of innovation in weatherization, thus optimizing the use of federal dollars to assist low-income populations.

Funding for Delaware’s WAP efforts comes from a variety of sources including federal grant funds from DOE, contributions through the Delaware Department of Health and Social Services (DHSS) from the federal Low Income Home Energy Assistance Program (LIHEAP) block grant program, funds from the Regional Greenhouse Gas Initiative (RGGI), and funds through a ratepayer funded effort of customers of Delmarva Power. All funds are managed by DEC and are directed to providing weatherization services to low-income Delawareans.

The Delaware Weatherization Assistance Program’s responsibilities include:

- Devise and submit statewide plans for federal DOE, LIHEAP, and other grants.
- Devise and submit statewide plans for state funds as may be required.

- Write and maintain policies and procedures that will maximize the implementation of the program benefits.
- Develop and maintain effective forms, as well as procedures that assist in the efficient and accountable delivery of services.
- Develop and maintain a statewide software system to manage data for the WAP.
- Formulate a statewide budget utilizing all funding resources in the most cost effective manner possible.
- Allocate grant funds through a fair and efficient formula, one that maximizes the use of the grant dollars.
- Set overall production targets for weatherization activities based on available funding.
- Set Price Lists for materials and labor.
- Review and approve local budgets and budget modifications to ensure compliance, efficiency and accountability.
- Review and approval of local plans and plan modifications to ensure compliance and effectiveness in policy implementation.

DNREC also has responsibilities for monitoring the quality and effectiveness of weatherization measures in the field including:

- Monitor program production reports submitted by the Subgrantee and vendors.
- Conduct annual monitoring of the local implementation of the program through an annual administrative review and annual case file reviews.
- Monitor the quality of weatherization work on individual units by reviewing energy audit and Final Inspection documentation and conducting quality assurance audits in the field.
- Monitor the proper payment of Subgrantee claims.
- Reviewing and monitoring of Subgrantee expenditures.

DEC also works with the DOE, the Subgrantee and the weatherization subcontractors, but takes the primary responsibility for obtaining the finest quality of technical assistance for the program. DNREC strives to not only increase the requirements for conducting weatherization work but to upgrade the quality of the weatherization workforce to meet those requirements through the best training and technical assistance available. DEC has also enlisted the help of various government and non-profit groups across the state to serve as advisors to the program and has formed the Weatherization Advisory Committee.

The bulk of the weatherization work is done through the WAP Subgrantee, a local non-profit or governmental body that is procured through an open statewide competitive bid process run through DEC. At the present time, Delaware has one statewide Subgrantee serving all of Delaware. DNREC has a contract with the statewide Subgrantee to administer weatherization services.

The Subgrantee then subcontracts with individuals and companies with the demonstrated capacity to perform the range of technical weatherization measures. The Subgrantee has the responsibility to ensure that weatherization services are delivered by such companies in a cost effective, accountable manner, in eligible units occupied by low-income families.

The Subgrantee must carefully plan all aspects of the delivery of weatherization services. Key roles of the Subgrantee in implementing the Weatherization Assistance Program include the following:

- Conduct outreach, education and publicity for the program.

- Maintain adequate staffing of the agency's program.
- Contract for weatherization services to be delivered by qualified subcontractors.
- Procure equipment, materials and supplies as required.
- Determine and verify program eligibility according to program eligibility rules.
- Provide energy education services.
- Explain the weatherization work to families.
- Maintain applications, correspondence, forms and documentation in an organized client case file.
- Assign a specific job order number traceable to every step in the weatherization process.
- Process any local client appeals.
- Coordinate weatherization workflow among the agency, the family and the subcontractors.
- Monitor the progress of weatherization work on the unit to ensure the work and time frames comply with the work order.
- Review the Final Inspection to ensure the work was completed properly, resolving issues with subcontractors, coordinating any re-works, etc.
- Approving units for payment only after Final Inspection is passed.
- Prepare, in cooperation with DEC, the Subgrantee program budget according to allowable cost categories.
- Review, approve and pay subcontractor claims for labor and materials in accordance with this Manual.
- Submit claims for reimbursement of weatherization expenditures to DNREC.
- Account for weatherization funds in accordance with applicable financial regulations and generally accepted fund accounting principles.
- Maintain a fair and competitive process for the procurement of weatherization related supplies, equipment and services.
- Institute an annual agency-wide audit including weatherization funds.
- Cooperate fully with WAP monitoring, fiscal reviews or other requests for fiscal information.
- Provide to DEC weekly, monthly and quarterly production reports as required.
- Provide and track contractor training and required certifications.

The annual revision of this Manual will reflect changes in state and/or federal regulations, advances in technology, and/or innovative approaches to weatherization. The DEC encourages Subgrantees and others engaged in weatherization work in Delaware to submit suggested changes to this Manual that will result in the delivery of services in a more cost effective manner while continuing to provide high quality work.

In limited circumstances, waivers from this Manual may be granted by the DNREC WAP Manager.

2. CLIENT SERVICES

2.1 APPLICATION

The key to an effective program is an open, fair and available process for taking weatherization applications from anyone who may be eligible. An application may be filed by any household member 18 years of age and over.

2.1.1 Where to Apply

The locations to apply for the WAP will be posted on the DNREC DEC website.

2.1.2 Application Procedure

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2.1.3 Waiting List Priorities

Because of the high demand for weatherization services, the program frequently has a waiting list for services. The waiting list is comprised of families who have qualified for the program as noted above. In determining the order of weatherization, priority is given to applicants on the waiting list with certain characteristics. Families with elderly or disabled members receive priority, as do families with children.

The Grantee has adopted the WAP Rank algorithm used within the Delaware Hancock Software WAP Online system in order to define the order in which units should receive weatherization services under this program. Subgrantees must use this WAP Rank to determine the order in which eligible units are weatherized, and eligible units with matching WAP Ranks should be weatherized according to application date. Deviations from the WAP Rank in the WAP On-Line database are permissible with the Subgrantee's Program Manager's approval.

2.2 ELIGIBILITY

A residential unit is eligible for weatherization services if it is occupied by a family whose total annual gross income is at or below 200 percent of the poverty level adjusted for family size. The WAP does not consider applicants to be categorically eligible based on other eligibility in other assistance programs.

The Subgrantee shall ensure that no units will be weatherized unless it is a dwelling unit occupied by a household that meets the financial requirements of the WAP at the time services are provided. Additionally, the Subgrantee shall ensure that no multi-unit dwellings are weatherized unless they meet additional and different requirements as determined in this WAP manual.

Any unit weatherized through the Delaware Weatherization Assistance Program on or after September 30, 1994, shall not be eligible for weatherization services and the Subgrantee shall not re-weatherize any such unit using any funds related to the Delaware Weatherization Assistance Program.

2.2.1 Proof of Identity

All families applying for services must prove identity. The head of the household must provide a form of identification, such as a state driver's license, which includes a photograph of the individual. All adult members of the household must provide a social security number documented by his/her social security card, this can be satisfied by having the social security cards scanned as part of the LIHEAP intake process. Social security numbers and birth dates must be provided for all minor children in the household, these data are satisfied when provided through the LIHEAP intake process. The Delaware driver's license for undocumented persons is not an acceptable form of identification for this Program.

All clients must provide proof of citizenship with the following types of documentation: birth certificate, passport, green card, etc. as per the state requirements for LIHEAP.

The form of proof must be one or more of the documents listed. The document must state the owner's name and the address of unit that is to be weatherized.

2.2.2 Proof of Ownership

Only the owner of the property may authorize weatherization work on the eligible unit. While we use the term "landlord", do not take for granted that the individual with whom the tenant is dealing is the actual owner of the property. Ownership of the property must be verified in all cases, regardless of who is occupying it.

Acceptable proofs of ownership include:

- deed
- mortgage or mortgage payment book
- real estate tax bill or receipt
- school tax bill or receipt
- written statement from local tax assessor's office, county or tribal clerk, or deeds commissioner
- Manufactured home bill of sale (If the bill of sale is not available, a notarized statement from the client may be acceptable.)
- Documentation of Land Grants, Life Tenancy or Life Lease

In the case where there are multiple owners on a deed, all owners must show written approval for the home to be weatherized and the documentation must be notarized. Even in the case where one of the owners is occupying the home, all owners must show written approval for the home to be weatherized and the documentation must be notarized.

Likewise, if there are multiple persons on the deed, the income eligibility is based only on the occupant of the home. During the home energy audit, the Energy Auditors should ensure that there are not more occupants than shown on the WAP application.

When a home is inherited, the current owner must provide a copy of the deed showing that the proper transfer has occurred into the new owner's name. Weatherization services will not be performed for owners that cannot show a deed or title to the home.

2.2.3 Categorical Eligibility

The Program does not consider any applicant for weatherization services to be categorically eligible. There is no specific guidance from the Department of Energy WAP, Department of

Health and Human Services, or state and local statutes that require categorical eligibility based on participation in other assistance programs.

2.2.4 Income Eligibility

A household is eligible to have their unit weatherized if the total family income on an annualized basis is at or below two hundred percent (200%) of the poverty level. The poverty level, established annually by the federal Department of Health and Human Services, is adjusted for family size. The total, combined, annualized, gross income in the family is counted in the eligibility calculation.

The financial eligibility determination for the WAP is valid for one year. In the case where a client's application expires in the weatherization database system, the client is required to (1) submit/verify income (2) update changes to who is living in the home (3) provide the required identification documents for new persons (4) and submit all income of persons in the home. All other information from the LIHEAP application is acceptable without having the client re-submit everything. In the event a client applies earlier in a calendar year through LIHEAP, the WAP will accept the documentation provided for the LIHEAP application if it falls within 12 months of the application date for LIHEAP.

Household income is the total annual gross cash receipts before taxes from all sources. Typical income sources include:

- Earnings, wages, salaries, tips
- Self-employment, business, farm income
- Regular, periodic payments to a household by outside family or other persons
- Training stipends
- Government benefits such as Social Security, Veteran's Benefit, Railroad Retirement, Unemployment Compensation, worker's compensation payments
- Strike benefits from union funds
- Alimony, verified child support
- Military family allotments
- Regular private pension benefits, government employee pensions
- Military Retirement
- Individual retirement account withdraws
- Regular insurance or annuity payments
- Dividends, interest
- Net rental income
- Net royalties
- Periodic receipts from estates or trusts
- Net gambling winnings, lottery winnings

2.2.4.1 Income Exclusions

The following sources are to be excluded as income to the household: capital gains; withdrawals from a bank savings account; the sale of property, a house, or a car; one-time payments from a welfare agency to a family or person who is in temporary financial

difficulty; tax refunds; one-time gifts; loans; lump sum inheritances; lump sum insurance payments; or, a lump sum compensation for injury.

The following benefits are also excluded as income to the household: employer-paid or union-paid portion of health insurance; employee fringe benefits; food or housing received in lieu of wages; the value of food and fuel produced and consumed on farms; the imputed value of rent from owner-occupied non-farm or farm housing; and, Federal benefits programs such as LIHEAP (DEAP), Medicare, Medicaid, Food Stamps, school lunches; and, housing assistance such as Housing Choice Voucher Program (Section 8) and Farmers Home Administration.

2.2.4.2 Income Documentation Procedures

Income must be verified through documentation from the source of the money. Most income, such as wages, comes with check stubs that indicate the amount and the dates paid. With benefits of various kinds, an award letter showing the benefit amount should be used. Except to corroborate other documents, bank deposit records should be avoided as documentation as the source of the amounts listed may not be clear on the statement.

Earned Income: The most recent 13 weeks (3 months) of pay history should be used to determine salary, wage and other periodic earned income. Care should be taken by the intake worker to understand the period of payment; in other words, whether the pay is drawn weekly, biweekly (every two weeks), or semi-monthly (two pays per month). The pay period makes a difference in how annualized income is figured.

In instances where the applicant cannot produce the complete sequence of paycheck stubs, a statement from the employer will be necessary to properly verify income for the 13-week period. Likewise, if the pay has been intermittent or the applicant has not been employed for three months, the employer will have to verify the dates of employment to compute the income. (In instances where employment has not been steady, the intake worker should inquire about the receipt of unemployment compensation.)

Regular Benefits: Most benefits, such as Social Security, may be verified by the latest award notice that is mailed to the recipient annually. In no instance may the documents verifying used to determine benefit amounts be more than one year old from the date of income determination.

Social Security may be verified at the Social Security Administration website where the applicant (or anyone) can generate an award letter which will be sent to the beneficiary's home address.

The documentation of income is the applicant's responsibility. However, good casework practices include assisting the family in obtaining verifications of information where appropriate and possible.

2.2.4.3 Annual Income Computation Procedures

(1) Benefits: For benefit income received in the same amount on a regular basis, such as Social Security benefits, the annual amount may be computed by (a.) multiplying the documented benefit amount times the total periods in a year; (b.) summing the actual past

years' worth of payments; or, (b.) by taking the most recent documented payments for three months and extrapolating an annual figure.

Example - The applicant verifies the three most recent monthly Social Security benefit payments. Those three payments are added up. The sum is divided by three to get the average monthly amount. Then the monthly amount is multiplied by twelve to obtain an annual figure for that source of income.

Example - The applicant receives \$450 per week in unemployment compensation benefits. The weekly benefit is multiplied by 4.3 to get a monthly amount. That total is multiplied by 12 months to obtain the annualized gross income figure.

(2) Earnings: With earnings, the process is the same, although it may be a little more complicated to arrive at the annual figure. Again, the applicant's documentation of the entire previous year's earnings may be summed for the annual earnings figure. Of course, a full years' documentation may not be available. Either the documents may not exist, or more likely, the applicant's earnings do not go back a year. Alternatively, the income has been intermittent. Therefore, these examples illustrate how the annualized income may be determined.

Example - Weekly Paychecks: In this example, the gross pay amount is documented for at least the most recent thirteen (13) weeks (three months). The sum of all earnings for the thirteen-week period is totaled. The total is multiplied by 4 to get the annual income figure for this individual.

Example - Biweekly Paychecks: In this example, the documented earnings are received every two weeks. In this instance, the most recent six paychecks are summed. The total is then multiplied by 4 (quarters) to get the total annual income figure for the individual.

Example - Semi-monthly Paychecks: In the final example, the documented earnings are received twice per month. In this instance, the latest six paychecks are documented. The total is divided by 13 (weeks) and the product is multiplied by 52 (weeks) to obtain the annualized amount.

As an alternative, applicants may present a copy of the current year's submitted (signed) tax form 1040 from which the adjusted gross income line may be used to compute the annual income figure. The information forms must match the name(s) and social security number(s) of the household members. This method may only be used in the calendar quarter in which the tax form was submitted.

(3) Self-employment Income: Self-employed applicants must present their most recent tax form 1040 form. The Adjusted Gross Income figure is the countable annual income for determining eligibility. Self-employed applicants, who claim that business income has changed dramatically since the taxes were computed, may be given a chance to verify the situation using the current tax year's quarterly tax filings. In that instance, the total number of filings for the year must be used. For example, if a self-employed applicant is applying in the fourth quarter of the year, three quarterly filings should be available for the current year. The annualized figure would be extrapolated from the documentation by multiplying the sum of the quarterly incomes by the number of filings and multiplying the product by 4 (quarters).

2.2.5 Multi-Family Buildings

Regulations (10 CFR 440.22(b)) allow for the weatherization of multi-family buildings but require that a percentage of the occupants be eligible for the weatherization services. For duplexes and four unit buildings 50% of the units must be occupied by eligible families. For multi-family complexes with five or more units, 66% of them must have eligible families.

An application and eligibility determination are, therefore, not required for non-eligible or empty units.

For reporting purposes, each non-eligible or empty unit should be listed as “Data Unavailable” when reporting income categories and demographics. To ensure that the percentage requirement is met, a separate list must be maintained, indicating the eligible and non-eligible or empty units. Subgrantees should also note that when weatherizing multi-family buildings, the amount to be spent on the building is determined by the number of income eligible units. (Example: When weatherizing a 20 unit building, if 15 of the units are eligible, you are only allowed \$97,500 (15 x \$6,500) for the 20 units.)

2.2.6 Group Homes and Shelters

RESERVED

2.2.7 Government Renovations

RESERVED

2.2.8 Re-weatherization

Federal Weatherization Program funds may not be used to re-weatherize a unit except if the unit was previously weatherized prior to September 30, 1994 and that the unit meets certain other requirements. It is the responsibility of the Subgrantee to determine whether a unit has already received weatherization services and the date on which those services occurred. The WAP maintains a list of all weatherized homes from 1996 through the current year called the Legacy List and it is provided to the Subgrantee each year. Be aware that the Program weatherizes homes and not people; therefore, it is possible to provide weatherization services many times for a client as long as their address is not the same.

The Grantee’s policy is that re-weatherization should not occur as a routine practice since many households have never received services. Before a unit can be re-weatherized, the Subgrantee must submit a written request to the Grantee explaining the need for re-weatherization and obtain written approval from the state agency. These units will be funded through sources other than Federal funds.

In determining whether to approve a re-weatherization of a particular unit, the Grantee will consider factors such as:

- funds are available for re-weatherization
- an older, less effective method was used which if re-done would result in energy savings
- a weatherization measure has failed over time which if re-done would result in energy savings
- other conditions in the unit, and
- other factors as appropriate.

All dwellings previously weatherized under a federally funded program have already been counted and reported as a weatherized dwelling. Re-weatherized units may not be counted again for state or federal numbers.

2.2.9 Rental Units

Weatherization services are to be provided to owner-occupied and rental units alike. Applications from families who are renting should be ranked and verified in the same manner as used with families who own the home in which they live. The Subgrantee may not refuse to weatherize an eligible rental property.

2.2.9.1 Landlord Agreement

In the instance that the qualifying unit is a rental, the Subgrantee must obtain the consent of the landlord (owner) of the home prior to conducting any weatherization work.

The landlord must sign the Landlord Agreement found in Appendix C of this Manual.

2.2.9.2 Landlord Contribution

Landlords are not required to contribute toward the cost of weatherization. However, they may do so voluntarily. Work on the unit agreed to by the landlord does not affect any aspect of the unit cost or the program. Landlord financial contributions made to the Subgrantee for weatherization work performed are to be considered by the Subgrantee to be program income and as such, used for weatherization work costs. Landlord contributions are strongly encouraged for any multi-family projects.

2.2.9.3 Proof of Tenancy

In the instance that the unit to be weatherized is a rental, proof of the applicant's tenancy must be obtained. The preferable documentation to prove tenancy is a lease signed by the owner/landlord. Other documents may be used such as a signed statement from the landlord, rent receipts signed by the landlord. Utility bills with the applicant's name and the unit address may be used but only with other documents establishing tenancy.

2.2.9.4 No Undue Enhancements

When determining the work plan on a rental unit, the Subgrantee should see that the benefits of the weatherization assistance accrue primarily to the low-income tenants. No undue enhancement to the property should occur beyond the scope of energy conservation. In other words, the purpose of the measures taken should always be to save energy costs on the tenant's utilities, not necessarily to improve the value of the property. Such measures as furnace replacement, window replacement and door replacement should be used sparingly in rental units, unless clearly warranted in the Energy Audit.

2.2.9.5 Rent Increase

Owners may not increase rent for a period of two years after completion because of unit's weatherization. Unless increases are demonstrably related to matters other than the weatherization work performed, the owner will have to re-pay the full cost of weatherization if rent is increased. Any dispute of the circumstances for a rent increase will be reviewed by the Subgrantee. The determination may also be reviewed by the Grantee, if requested by the parties involved.

2.3 DEFERRAL PROCEDURES

The Delaware Weatherization Assistance Program may elect to defer a home from receiving weatherization services where health and safety hazards exist for our staff, contractors or our clients or where conditions prevent the safe and effective emplacement of weatherization measures. If a unit is deferred at any time during the weatherization process, the Subgrantee shall make every effort to refer the unit owner or renter to the appropriate service agency or organization that may be able to resolve the cause for the deferral. The deferral policy contained herein is also a component of the Health and Safety Plan found in Appendix B.

2.3.1 Causes for Deferral

Conditions which may cause a home to be deferred, when they cannot be resolved prior to or as a part of weatherization services as defined in this guidance, may include, but are not limited to the following:

- Structurally unsound dwellings.
- Evidence of substantial, persistent infestations of rodents, insects and other vermin.
- Electrical or plumbing hazards
- The presence of sewage in any part of the dwelling unit, basement or crawl space.
- Environmental hazards such as serious moisture problems, carbon monoxide, gas leaks, friable asbestos or other hazardous materials
- Substantial amounts of standing water in the crawl space or basement.
- The presence of animal feces in any area of the dwelling unit where program staff must perform weatherization measures.
- Excessive garbage build-up in and around the dwelling unit which limits the program staff's access to the dwelling and encourages rodent infestations.
- Major remodeling is in progress which limits the proper completion of major weatherization measures.
- Cases where the client refuses major weatherization measures or refuses to make modifications necessary to permit measures from being completed.
- Maintenance and housekeeping practices (hoarding) that are negligent to the point of limiting the access of program staff to the dwelling, or creating an unwholesome working environment.
- An overt threat of violence to any program staff member or any household member during the weatherization process.
- The presence and/or use of any controlled substance in the dwelling unit during the weatherization process.

2.3.2 Deferral Procedures and Contractor Payment

2.3.2.1 Deferrals at Beginning of Energy Audit

The Energy Auditor should first perform the health and safety assessment to determine if weatherization can continue prior to performing the energy audit. If an Energy Auditor arrives at a home, begins to review the home and determines it should be deferred prior to concluding the energy audit, the Energy Auditor shall immediately contact the Subgrantee to describe the situation and ask for guidance. The Energy Auditor should continue with and complete the health and safety assessment, but shall not begin the energy audit if deferral is likely. If possible, the Subgrantee may want to meet the Energy Auditor in the field to discuss the situation further and brainstorm ideas for getting the home in a condition where an energy audit can be conducted. No home may be deferred without first having checked with the Subgrantee.

If it is finally decided to defer the home, the auditor shall have the homeowner sign the deferral form, noting the one or more reasons why the home is deferred. A copy of the Deferral Form is in Appendix D. The Subgrantee should then be notified and try to get the homeowner any help or resources needed to correct the situation. If alternate funding can be coordinated to address the health and safety hazard within 60 days of the initial assessment, the work can be delayed and the energy audit performed once alternate funds are approved.

If deferred at this stage, a third party auditor will be entitled to a payment as shown on the Delaware Price List for an energy audit cut short for deferral reason. Payment may be made at any time following the determination of deferral, upon receipt of a suitable invoice from the third party auditor. In the case where the auditor is an employee of the Subgrantee, there is no fee paid for the energy audit.

If the cause of the deferral is resolved, the Subgrantee shall assign the same auditor to the unit to conclude the energy audit. In the case of using a third party auditor, the auditor shall be entitled to the complete payment for the energy audit as shown on the Price List.

2.3.2.2 Deferrals during Energy Audit

If the Energy Auditor feels that the house should be deferred for a problem that may be easily fixed, and that the home will eventually be weatherized, the energy audit may continue. However, the auditor shall contact the Subgrantee to describe the situation and ask for guidance. If possible, the Subgrantee representative may want to meet the auditor in the field to discuss the situation further and brainstorm ideas for getting the home in a condition where a deferral may not be necessary. No home may be deferred without first having checked with the Subgrantee.

If it is finally decided to defer the home, the auditor shall have the homeowner sign the deferral form, noting the one or more reasons why the home is deferred. The Subgrantee should then be notified and try to get the homeowner any help or resources needed to correct the situation. The completed energy audit shall be provided to the Subgrantee.

If deferred, and the energy audit was completed, the third party Energy Auditor will be entitled to the full audit costs on the Price List. However, payment may not be made unless

and until the “Administrative Procedures to be followed for Deferred Units” below is concluded.

2.3.2.3 Deferral at Time of Measure Installation

Causes for deferral may be discovered at any time during the process of weatherizing a unit, only because causes may not be known until work actually commences, or more close examination by workers reveals something not otherwise discovered. The goal is to discover any and all causes for deferral in the energy audit stage, hopefully before an audit ever commences. Deferrals during weatherization installation may also prompt a need for partial weatherization.

2.3.2.3.1 Deferral at time of initial arrival

Any mechanical or installation contractor arriving on site and, before conducting any work, discovers what they believe to be a cause for deferral shall immediately contact the Energy Auditor to discuss the situation and determine a course of action. No work shall be done on the home. If deferral of the unit is agreed upon, the contractor shall fill out a deferral form on site and obtain the client’s signature at the time of deferral. The contractor shall then be entitled to a payment for the deferral in the amount of \$200; as long as any billable work does not exceed \$200. If the contractor’s billable time on the job (before the deferral was discovered/reported) exceeds the \$200 deferral fee, the deferral fee is no longer chargeable and instead the contractor should be paid for their work on the home only.

2.3.2.3.2 Deferral after measures are installed, but before work is complete

Any mechanical or installation contractor arriving on site and, after any billable work is conducted, discovers what they believe to be a cause for deferral, shall immediately contact the Energy Auditor and/or the Subgrantee to discuss the situation and determine a course of action. Based on the situation, the Subgrantee may authorize completion of any one or more measures on the work order and deferral of the home thereafter. If deferral of the unit is agreed upon, the contractor shall fill out a deferral form on site and obtain the client’s signature at the time of deferral. The contractor shall then submit an invoice for the work conducted but shall not be entitled to any compensation for the deferral itself as allowable under (a) above.

2.3.3 Partial Weatherization

Partial weatherization is allowable where one or more audit-approved energy conservation measures are or can be installed without any cause for deferral endangering the work conducted, where the work will not create or exacerbate any health or safety issue. Partial weatherization of homes shall be considered highly unusual and the Grantee will make a determination as to whether the unit can be considered a completed weatherization unit.

2.3.4 Administrative Procedures for Deferred Units

The owner/occupant of any unit that is deferred by the Subgrantee must be informed in writing of the deferral, and the cause of the deferral. The denial notice shall include instructions for appeal of the denial and/or the steps the household must take to allow the agency to proceed with

weatherization services. This notice shall then be signed by the homeowner and the Subgrantee or their agent (auditor, contractor) and the record of such deferral must be kept in the client file.

If a unit is deferred at any time during the weatherization process, the Subgrantee shall make every effort to refer the unit owner or renter to the appropriate service agency or organization that may be able to resolve the cause for the deferral.

If the owner/occupant later comes forward with written evidence that the cause of the deferral has been rectified, and they remain eligible, they may again be put on the waiting list to receive services.

2.3.5 Deferral Notification and Appeal

Appeals to deferrals must be in writing and be received by the Subgrantee within 15 business days of the receipt of the deferral notice. Appeals received after the fifteen-day period should be returned with a notice stating that it will not be considered as it was submitted beyond the deadline.

The Subgrantee should use its normal internal procedure for reviewing appeals. Appealed decisions are to be reviewed by an agency staff person, at least one level higher than the person who made the decision on the case eligibility. That person's decision should be communicated to the appellant in writing no later than ten (10) days following the receipt of the appeal.

The appeal decision notice must clearly state:

- The acceptance or denial of the appeal; and, if denied:
- the appellant's right to a final appeal to the Grantee;
- The appellant has an additional ten (10) business days from the date of the second letter to appeal to the state; and,
- The procedure for further appeal to the Grantee, including the address of the Grantee for further appeal.

When the appeal is received at the Grantee, the state WAP Manager will review the case. The WAP Manager may request case file materials and talk personally to the Subgrantee staff and/or the appellant. The appellant and the Subgrantee will be notified of the state's decision within ten (10) days of receipt of the appeal. After the state decision is issued, no other administrative appeal steps will be available to the denied applicant.

Nothing in this process is to be construed as limiting an applicant's right to seeking additional judicial remedy.

2.4 PRODUCTION WORKFLOW

The weatherization workflow begins with the Subgrantee's determination of eligibility based on the household's complete, signed and approved application. The Subgrantee caseworker will have explained the weatherization process to the family. The family and/ or the owner will have signed necessary release forms. In addition, the unit will have been pulled from the waiting list strictly according to the priorities of the program.

2.4.1 Implementation of Weatherization Measures

The Subgrantee has the responsibility for determining the weatherization services to be implemented with each eligible unit. The first step is to order an energy audit by a qualified Energy Auditor. Once the written audit report is completed, the Subgrantee is responsible for formulating the Work Order; based on the audit results, the auditor's recommended measures and the funds available. The Work Order is then assigned to appropriate subcontractor for scheduling.

As the weatherization work progresses, it is monitored by the Subgrantee to ensure the work is completed in conformance to program standards and within the agreed upon schedule. Once the subcontractor has pronounced the work complete, the Subgrantee schedules a Final Inspection of the work to be conducted by a quality control inspector (QCI).

After the work passes Final Inspection, the Subgrantee approves and pays subcontractor invoices in accordance with this Manual. In all cases, the Subgrantee and its subcontractors shall utilize the Delaware Standard Work Specifications (SWS), the Delaware Field Guide (Chapter 3 of this Manual); as well as, training and technical assistance presented by the Grantee or the DOE in all weatherization work.

2.4.2 Production Schedule

The energy audit, based on the evaluation of the relative cost effectiveness of each of the measures, dictates the order in which they are to be conducted or installed. The Subgrantee shall not conduct any weatherization measures on any unit until after it undertakes an energy audit. The energy audit must be conducted by a qualified auditor and in a manner prescribed in writing by the Grantee. The purpose of the energy audit will be to identify the most cost effective weatherization measures to be taken to maximize energy efficiency in the dwelling.

The alleviation of health and safety issues always takes precedence over the weatherization energy efficiency measures, and shall be listed on the work order first, before any energy conservation measures.

The Subgrantee shall select weatherization measures according to the energy efficiency savings to investment ratio or prescribed by the Grantee, as identified in this manual. The Subgrantee shall review the recommended measures to assure that the measures are cost effective. Except for work that is necessary for the health and safety of the client, weatherization measures shall only be undertaken for the purpose of energy efficiency.

The Subgrantee shall select a qualified subcontractor(s) from its pool of available subcontractors to conduct the various weatherization measures listed in order to proceed to weatherization work. Additionally, the Subgrantee shall select a subcontractor for each job from the pool of available subcontractors based on cost, competency with the specific measures, and past performance. It is the responsibility of the Subgrantee to coordinate the weatherization activities in each unit to ensure the job is done properly and in the agreed upon time frame. The scheduling of several jobs at a time, as well as outside work schedules, may affect the availability of any given subcontractor. Likewise, the household's schedule may have an impact on the job timing and duration. Other factors such as time of year, the weather, and work site accessibility may all enter into the difficulties of coordinating the work. Even factors such as Subgrantee contract and budgetary status may enter into the production schedule. It is up to the Subgrantee program management to take all of the factors into account in order to maintain an ambitious schedule, which will meet the overall production goals of the program.

Subcontractors will be required to complete units within the time frame established for each unit by the Subgrantee. Any anticipated delays in the completion time frame on the part of the subcontractor shall be communicated to the Subgrantee in writing, prior to accepting work assignment. Subsequent changes in the schedule must also be requested in writing and addressed as an official modification of the Work Order.

The volume of work assigned to any one subcontractor will be determined through negotiations between the Subgrantee and the subcontractor on an individual job, predicated on the contractor's capacity to complete the work in the time stipulated, and the quality of workmanship previously demonstrated.

The subcontractor may not commence with any work until written authorization is received from the Subgrantee in the form of an executed, signed Work Order.

The Subgrantee shall work with the program client to educate the client with respect to weatherization work including explaining its costs and benefits and the client's responsibilities (for example the need to change furnace filters). Throughout the process, the Subgrantee will act as a liaison between the family and the weatherization subcontractor.

2.4.3 Final Inspection

The Subgrantee shall ensure that all units receive a Final Inspection, and all federally funded units are inspected by a Quality Control Inspector (QCI) that has valid credentials for a QCI. Using different employees within the Subgrantee's staff to conduct energy audits and inspections on the same unit is permissible as long as each receives a Final Inspection. If a QCI is the Energy Auditor that performs the initial energy audit, that same QCI can perform the Final Inspection. Once the weatherization work is reported by the subcontractor(s) as complete, the Subgrantee will arrange for a Final Inspection.

The Subgrantee shall ensure that all weatherization work activities are conducted in compliance with accepted standards of workmanship as prescribed by the Delaware Field Guide, Delaware Standard Work Specifications, and WAP policies and procedures. One hundred percent (100%) of the weatherized units must pass the Final Inspection, and any unit that is federally funded must receive a Final Inspection from a QCI.

2.4.4 Contractor Work Schedules and Notification

The WAP requires the coordination of State and Subgrantee administrators, State Monitors, Subgrantee field staff, and weatherization installers in order to maintain effectiveness and efficiency. This policy will establish a protocol for ensuring that all program participants receive the information they need in a timely manner in order to effectively carry out their role in the Program.

The following steps shall be taken by the Subgrantee:

- Subgrantee shall create a list of all scheduled energy audit, inspection, and installation work for the following week and transmit this list by email to the State Monitor by 1:00 PM on the preceding Friday.
- The list of scheduled work should be organized by date and must include, at a minimum, the following information:
 - a. Unit Address

- b. Client Name
- c. Contractor Name
- d. Job Start Time
- e. Job End Time

- Changes, cancellations, and additions to the transmitted schedule must be communicated to the aforementioned State contact no less than twenty-four (24) hours prior to the start of the subject work change.
- Subgrantee may utilize tools such as Google Calendar to comply with this section.

2.4.5 Final Review

With the receipt of the Final Inspection, it is an ideal time for the Subgrantee to review the entire case for its quality, compliance and accuracy. The Subgrantee is responsible for reviewing the quality of every aspect of the weatherization work completed on each unit, including:

- Processing the application & accurately determining eligibility;
- Arranging for an effective energy audit of the unit;
- Devising an effective work order within program priorities and fiscal bounds;
- Overseeing the actual weatherization work; and,
- Obtaining a final inspection that ensures the work is complete and correct.

The Subgrantee may not invoice the Grantee for the unit or report the unit as completed until it has passed the Final Inspection. Before submitting the unit for claim, the Subgrantee must reconcile the work completed by matching the following information:

- The weatherization measures called for in the Work Order (based on the energy audit and including approved modifications), with
- The weatherization measures invoiced by each subcontractor, and with
- The weatherization measures reviewed and passed in the Final Inspection.

Likewise the Subgrantee must match each cost which the subcontractor invoices for each measure to the agreed upon price, as applicable; from the subcontractor's approved proposal, from a WAP Price List or as a specific price negotiated between the Subgrantee and the subcontractor.

The Subgrantee may not submit an invoice for the unit until any discrepancies in the measures or their costs have been reconciled.

The subcontractor is responsible for all damages resulting from improper installation of weatherization materials and/or mechanical systems.

2.4.6 Reworks

At any point when the work does not pass the Final Inspection, or discrepancies between what was ordered and what was delivered cannot be reconciled, the payments to subcontractor(s) are to be withheld. The Subgrantee shall immediately notify the subcontractor(s) with written documentation as to the reason for the withholding of payment.

The subcontractor(s) may be given a reasonable amount of time (not to exceed 30 days) to return to the unit to rework the rejected weatherization measure(s). Once the subcontractor has submitted work to the Subgrantee as "complete", the cost of any subsequent rework needed to pass inspection is to be the responsibility of the subcontractor.

If the subcontractor refuses to rework a rejected measure or 30 days has lapsed, the Subgrantee should re-order the specific work to another subcontractor from the appropriate pool. The original company's invoice will be adjusted to remove the rejected measures. Other acceptable work that passed the Final Inspection would be paid for, and the company may then be disqualified from subsequent work in the Program.

Rework Dispute: In the instance that a technical dispute over passing a rework cannot be resolved, the Subgrantee should call for a third-party inspection by the State Monitor. In that case, the opinion of the Grantee will be binding on the resolution of the dispute.

2.4.7 Subcontractor Warranty and Assurances

The subcontractor is responsible for all damages resulting from improper installation of weatherization materials and/or mechanical systems.

The subcontractor must conduct additional work at its own expense on any job that does not pass the Final Inspection due to inadequate work practices, the use of unapproved materials, or incorrect materials.

The subcontractor must provide a warranty against defects in materials, manufacture, design, or installation of work performed under contract for the period of one (1) year from the date the unit passes the Final Inspection.

3. FIELD GUIDE AND STANDARDS

Reserved – see separate, latest version of the Field Guide

4. ADMINISTRATION

4.1 KEY PROGRAM PROVISIONS

4.1.1 Cost Effectiveness

Subgrantees may only authorize weatherization funding for energy efficiency measures which are cost effective; a measure which will result in a Savings to Investment Ratio (SIR) of 1.0 or greater. The SIR is a figure that results from dividing the energy cost savings of a measure over its expected lifetime by the total cost of the measure.

As an example, if the cost of insulating an attic is \$1,000, the projected energy savings is \$150 per year and the insulation is expected to be effective for ten years, the SIR equation would be $(\$150 \times 10 \text{ years}) / \$1,000$, which equals 1.5. Therefore, the SIR result is greater than a ratio of 1.0, indicating that the measure is cost effective.

Not only does the SIR prove the cost effectiveness of the individual measure, it can be used to rank measures for the order in which they are to be installed. For example, perhaps sealing a large bypass gap into the attic computes at a SIR rating of 2.5 (because it costs so little for the job compared to the effect on heat loss). The air sealing measure will be listed before the insulation work above, as comparative ratings indicate a higher cost effectiveness ratio. The Energy Auditor's plan for weatherization will rank measures by priority based on the comparative SIR ratings.

The cumulative SIR ratings can also be used as a measure of overall effectiveness of the WAP both in each unit and in the Program itself. There are measures that are routinely and normally used in the majority of units that are known to be demonstrably cost effective; the DOE regulations allow states to determine a Priority List of measures which may be used without having to determine the SIR each time.

Payment to the Subgrantee is not allowable if the measure is not proven to be cost effective, either by individual SIR calculations or by its inclusion on the Delaware Priority Lists. Allowable health and safety measures are in a separate cost category and do not have to meet the SIR criteria.

4.1.2 Average Cost per Unit

The Subgrantee's program operations costs are limited to an average cost per unit which is set annually by DOE. The average cost per unit set by DOE can be found in the most recent WPN guidelines for the current Program Year. The Grantee may elect to set a lower average cost per unit and will make that known to the Subgrantee prior to contract. The average cost requirement must be met by the Subgrantee over the period of the contract. Failure to meet the requirement may result in a repayment of Program Operations funds.

4.1.3 Program Year (PY)

The Grantee's PY operates from April 1st to March 31st of each year, as specified by DOE. The Subgrantee is required to track and report units and unit output by PY.

4.1.4 Price List and Negotiable Instrument Definition (NID) Items

Delaware uses a Price List for setting costs associated with a myriad of differing weatherization measures. Prices are generally split between labor and materials and contractors are required to invoice the Subgrantee's using the Price List as a template for invoiced charges.

The Price List should reflect the lowest possible reasonable cost for the activity. Costs are set by the Grantee and the Price List is made available to Subgrantees and contractors periodically. The Price List is central to determination of subcontractors to enter into the program and contracts with the Subgrantees, so changes to the list during contract periods should be done only in instances where documented problems exist with the list, prices being too high or too low, and new weatherization measures need to be added. The Grantee may alter the Price List at any time that conditions warrant, as noted above.

NID items may be required to address instances where activities on site are not included in the Price List and are legitimate weatherization, health and safety, ancillary, or incidental repair measures needed to properly weatherize a home. NID items will normally be paid at labor and material costs, with labor costs set in the Price List. NID items need to be clearly labeled, described, justified, and categorized by WAP market title in a supplemental form, include labor and material costs, be included on the work order or change order, and be approved and signed by the contractor and the Subgrantee. Receipts for materials used in NID work must be included in the file, and each item listed on the form must directly reference the source of authorization for the work.

4.1.5 Historic Preservation

Prior to the authorization of federal weatherization funds, the Subgrantee should determine whether the unit is listed under a historical preservation program. If so, the specific federal, state or local program requirements must be considered in the formulation of the weatherization Work Order. Weatherization measures may be altered or skipped altogether for requirements of historic preservation.

Prior to authorizing, initiating, or expending funds for the alteration of any structure older than 45 years, the Subgrantee is required to comply with the requirements of Section 106 of 16 U.S.C. 470 the National Historic Preservation Act (NHPA) and the Programmatic Agreement between DOE, DNREC and the State Historic Preservation Office (SHPO Agreement). The SHPO Agreement in place for Delaware exempts much of what the WAP Program does in homes from further consideration under NHPA; however, WAP must document how each home is treated under NHPA and certify that the weatherization measures to be conducted in each home are among those specific measures exempted from further review through the SHPO Agreement. Contained in the SHPO Agreement on pages 9 and 10 are the exempted activities pertaining specifically to weatherization (attached as Appendix E). For a home that is greater than 45 years old and a proposed weatherization measure that is not among those exempted, the Subgrantee must defer the home, delete the measure from the work order or contact the Grantee for further instruction.

The DOE Weatherization Program Notice 10-12 and the programmatic Agreement between DNREC and the Delaware State Historic Preservation Office require that a Historic Preservation Form be completed for each unit that is greater than 45 years old and be contained in the client file.

4.2 SUBGRANTEE OPERATING PRINCIPLES

4.2.1 Contract

The WAP is conducted under a contract between DNREC DEC and the Subgrantee for expenditures of weatherization funds. The amount of the contract will be determined by the Grantee based on the amount of weatherization funding available and the target population in the Subgrantee's service area.

The standard period of the contract is normally for one-year period or until otherwise terminated as stipulated in the contract. Contract periods of more or less than one year are at the discretion of the Grantee WAP Manager.

4.2.2 Plan and Budget

The Subgrantee and the Grantee will negotiate a budget for the use of each year's funding, in a form prescribed by the Grantee. Further, the Subgrantee may be required to develop a plan for the upcoming PY that should include, but not be limited to:

- A projection of the number of units to be weatherized over period for each budget.
- A narrative explanation of the budgeted line items, as requested.
- A list of proposed subcontractors.
- A plan to address health and safety.
- A training and technical assistance budget and plan, listing proposed training events for the budget period.
- Other information as requested by the Grantee.

The Subgrantee may propose to the Grantee a modification of its original weatherization budget(s) at any time during the contract year. The Grantee will formally approve, deny or amend the budget request in writing. A rule of thumb is that a particular line item should be officially modified if the projected expenditures exceed a 10% deviation from the amount budgeted. Projecting expenditures each month and monthly expenditure reports to the Grantee will ensure that the Subgrantee is on track to spend the expected amount and not exceed limited line items.

Budget modifications may be required at any time the Subgrantee projects exceeding the limits on capped line items, exceeding the average cost per unit, or exceeding the overall agency budget amount.

All budget modifications shall be submitted to the Grantee for approval and approved by the Grantee before any expenses on those modifications are made.

4.2.3 Failure to Meet Program Goals

The Grantee will monitor production reports submitted by the Subgrantee during the contract to see that the number of weatherization completions and Subgrantee expenditures meet quarterly goals. In addition to production, Subgrantee deficiencies in programmatic, financial, and technical requirements will be tracked through formal and informal reviews. The Grantee will develop a corrective action plan (CAP) to address production and/or deficiencies stating deadlines for compliance with Program goals.

If production continues to fall short of Program goals, the Grantee may impose probation, suspension, de-obligation, or redistribution of all or any portion of the funds allocated to the Subgrantee. In the case of a reduction in the Subgrantee's contracted amount, the decrease will not exceed the total of already properly expended funds. The portion of funds de-obligated will approximately be proportional to the projected production shortfall for the remainder of the contract. If any of the aforementioned actions are taken by the Grantee, the Subgrantee will be informed in writing.

If deficiencies continue and/or deadlines for compliance are not met, the Grantee may issue suspension, de-obligate, impose probation, and/or terminate the Subgrantee from the Program. If any of the aforementioned actions are taken by the Grantee, the Subgrantee will be informed in writing.

4.2.4 Subgrantee Subcontracting

The Subgrantee may not subcontract any part of the WAP without the expressed, written permission by the Grantee. A list of proposed subcontractors is to be submitted to the Grantee prior to the Subgrantee signing of the contracts along with the Subgrantee's budgets, prior to the beginning of the contract year.

While recognizing the Subgrantee's responsibility for choosing its own business relationships, the Grantee reserves the right to review and approve the process used to select subcontractors as well as contracts between Subgrantees and subcontractors. Subcontractors must be selected based on a competitive proposal process as detailed in this WAP manual. Because of the highly technical nature of the Program, the qualifications of the selected subcontractors must be given a higher priority when the subcontractor possesses qualifications and certifications specific to the WAP.

When any aspect of the Program, such as the actual weatherization services is subcontracted, the Subgrantee is responsible for all program activities of the subcontractor. Subgrantees must monitor the ongoing performance of subcontractors to ensure compliance with Program assurances, regulations, policies and workmanship standards.

4.2.5 Conflicts of Interest

No employee, officer, or agent of the Grantee or the Subgrantee shall participate in the election, award, or administration of a weatherization contract or subcontract if a real or apparent conflict of interest would be involved.

No employee, officer, agent, or subcontractor of the Grantee or of the Subgrantee who may be in a position to participate in the decision making process may derive an inappropriate personal or financial interest or benefit from any activity funded through a contract or subcontract, either for him or for those with whom he has family or business ties.

The officers, employees, and agents of the Grantee and of the Subgrantee shall neither solicit nor accept gratuities, favors, or anything of monetary value from Subgrantees or contractors, or parties to contracts or subcontracts.

If any organization, agency or company responding to a procurement request offers such gratuities, favors, or anything of monetary value to any officers, employees, and agents of the Grantee and of the Subgrantee, said entity and its employees will be disqualified from participation in current and future weatherization contracts.

4.2.6 Discrimination Prohibition

The Subgrantee and subcontractor may not discriminate against any applicants, staff, personnel, suppliers, clients or others connected to the WAP on the basis of race, color, creed, religion, sex, age, national origin, or disability. Neither shall discrimination be based on present or past military status. Nor shall discrimination be based on sexual orientation.

4.2.7 Debarment, Suspension and Termination

The Subgrantee must certify that within the last five (5) years, and afterward annually, that neither the organization nor its principals are debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participation in a weatherization contract with the Grantee, the State of Delaware or any federal department or agency. The Subgrantee must contractually require the same certification by its subcontractors.

The Grantee will annually review the Subgrantee's obligation to certify that a contractor is not on the debarment list.

In the event that the Grantee finds the Subgrantee unable to comply with all of the state and federal WAP policies, procedures, rules and regulations, the Grantee may decide to debar the Subgrantee from participation in the WAP. Upon documentation and communication with a Subgrantee through Grantee prescribed corrective actions, a Subgrantee will be given the opportunity to achieve compliance. If the Subgrantee does not come into compliance given a prescribed amount of time, the Subgrantee can be suspended, placed on probation, and/or

terminated. In the event the Subgrantee is terminated; the Subgrantee may be temporarily or permanently debarred from the Delaware WAP.

4.2.8 Drug-free Workplace

The Subgrantee must make a good faith effort to provide and maintain a drug-free workplace. The Subgrantee is required to give written notice to the Grantee within ten (10) days after receiving actual notice that an employee has been convicted of a criminal drug violation occurring in the workplace.

4.2.9 Criminal Background Investigations

Subcontractors are not required to provide or conduct criminal background checks on their employees; however, subcontractors must give written notice to the Grantee and the relevant Subgrantee(s) within ten (10) days after learning that an employee has been convicted of any criminal offense. It is the Subcontractors responsibility to ensure that their employees are trusted to enter homes and act in a legal and responsible fashion. Any illegal or inappropriate behavior on the client's property shall be cause for removal of the employee and the subcontractor from the Program, at the Subgrantee and/or the Grantee's discretion.

4.2.10 Ownership of Intellectual Property

All copyright and patent rights to all papers, reports, forms, materials, creations, or inventions created or developed in the performance of the Delaware Weatherization Assistance Program is the sole property of the State of Delaware.

4.2.11 Religious Activities

The rendering of weatherization services is non-sectarian in nature. The Subgrantee must ensure that religious activities are not a part of any activities funded under the grant.

4.2.12 Political Activity

The Subgrantee must ensure that the funding provided by the Grantee through the weatherization contract is not be used to further any type of political or voter activity.

The Subgrantee must comply with applicable provisions of the Hatch Act (5 U.S.C. §§ 1501-1508 and 7324-7326) which limit the political activities of employees whose principal employment activities are funded in whole or in part with weatherization funds.

4.2.13 Legislative Contact

The Subgrantee may not use weatherization funds to lobby, or to directly or indirectly influence action on any legislation or appropriation matters before federal or state legislative bodies. The Subgrantee may provide educational or other information regarding the WAP, as appropriate.

4.2.14 Whistleblower Protection

The Subgrantee may not discharge, demote, or otherwise discriminate against an employee as a reprisal for disclosing "whistleblower" information; such as mismanagement, abuse, fraud, legal violations, non-competitive procurement, and so forth.

4.3 FUNDS MANAGEMENT

The proper administration of funds begins with the quality of the Subgrantee's own internal fiscal controls and accounting procedures. The Subgrantee must maintain written fiscal procedures which are periodically reviewed and approved by its governing board. The disbursement of weatherization funds must be properly documented and tracked in a systematic, transparent method.

4.3.1 Financial Records

All Accounting records related to budgets, claims, and purchases must be maintained in accordance with this policy and generally accepted accounting principles for fund accounting. The Subgrantee's financial records shall include, but are not limited to:

- Accounting books, ledgers, charts,
- Time sheets, payroll forms, wage records,
- Accounting reports, bank statements,
- Fiscal reviews, audits,
- Tax records, tax withholding records,
- Source documents, bills, claims, canceled checks,
- Job descriptions, pay rates, pay schedules,
- Inventory of equipment and vehicles, and
- Other fiscal forms and reports, as required by the Grantee.

Such records shall be sufficient to fully document the Subgrantee's financial activities, including the Subgrantee's claims for reimbursement under its weatherization contract with the Grantee. All fiscal accounting records must be made available to the Grantee, the State of Delaware or other appropriate agencies, upon request.

The Subgrantee must have accounting systems in place to ensure expenditures stay within budget. It is the responsibility of the Subgrantee to track its expenditures over the period of the contract so that funding allocations are not over-expended. It is the responsibility of the Subgrantee not to exceed line item limitations, including the average cost per unit, over the period of the contract.

Accounting systems will be evaluated as a part of the Grantee administrative monitoring process, as well as in the Subgrantee agency's fiscal audit.

4.3.2 Program Income

Program Income is an amount of money received by the Subgrantee for activities, which are supported directly by a WAP grant. This would include payments received by the Subgrantee for work conducted outside the program utilizing WAP supported resources.

The WAP requires Subgrantees to use program income to pay subsequent expenditures that would have been otherwise claimed from the funding source which benefited by the receipt of the funds. For example, if the DOE funding benefited by the program income, the funds would be used for subsequent work under the DOE grant.

Program Income must be expended at least by the end of the contract period following the period in which it was earned. The receipt of program income and the subsequent expenditures in the appropriate program must be documented by the Subgrantee and reported to the Grantee.

Landlord/owner contributions to the work on a unit are not considered program income under DOE regulations. However, such contributions must be applied to the cost of the specific job for which they are made. The Subgrantee's claim for that unit should reflect a credit for the amount paid by the landlord.

Interest earned on any advance funds is also considered program income per 2 CFR Part 200 regulations.

4.3.3 Segregation of Funds

RESERVED

4.3.4 Supplanted Funds

Weatherization funds may not be used to supplant other state or local funds that may be used instead for the same purpose.

4.3.5 Leveraged Funds

RESERVED

4.3.6 Capital Expenditures

The Subgrantee may not use WAP grant funds for the purchase or improvement of land. WAP funds may not be used for the purchase, construction, or improvements of any building or other facility. As defined by the program policies, funds may be used for residential weatherization or other energy related home repairs.

4.4 INVENTORY

The Subgrantee is required to track the purchase, use and disposition of all inventory purchased with WAP funds as detailed below. The inventory should be reviewed by the Subgrantee annually and be available for monitoring by the Grantee in its administrative review of the Subgrantee.

4.4.1 Inventory Schedule

The Subgrantee must have an inventory of all equipment and supplies purchased to operate the program. In limited circumstances, the Subgrantee may purchase and keep a supply of weatherization parts or materials. Subgrantees may also have an inventory of other equipment purchased for use in the program.

The Subgrantee must maintain an inventory schedule for all items in compliance with 2 CFR 200, to include:

- Item name, brand, brief description
- Identification number: model number or serial number
- Funding source of the equipment
- Title vested (who holds the title, either the Grantee, Subgrantee, or federal government)
- Acquisition date
- Percentage of federal participation (how much of the cost is allocated to federal participation)

- Physical location of the item
- Acquisition cost
- Condition of the item, and
- Current status of the item

Inventory purchases must be fully documented on the schedule, including:

- A justification for the procurement process used
- Documentation of the procurement of the item(s)
- Documentation of prior approval, when required, and
- Purchase order, invoice, receipt, other source document(s) pertaining to the purchase.

A physical inventory of parts, materials, supplies and equipment is required annually. Any discrepancy between the book inventory and the physical count in the Subgrantee's inventory which exceeds the supply or equipment thresholds in Section 4.4.3 below must be reported to the Grantee along with a written description of how the lost or damaged inventory item(s) will be replaced by the Subgrantee.

4.4.2 Disposition of Inventory

The Subgrantee must keep complete records of the use and disposal of items in its inventory. Use of weatherization parts and materials from the Subgrantee's inventory should be recorded on the individual weatherization job on which they are used, by Job Name.

Because equipment and field supplies are purchased with program funds and are considered the property of the Program, the Subgrantee must notify the Grantee prior to disposing of equipment or field supplies purchased with WAP funds. The Subgrantee will be instructed as to how such equipment or field supplies are to be disposed of. Equipment must be sold at fair market value. The Grantee will assist the Subgrantee in establishing the value.

In certain situations, equipment may be depreciated over time by the Subgrantee. Upon request, the Subgrantee shall submit all relevant depreciation schedules with its independent fiscal audit report.

Subgrantee may not purchase or maintain inventory, which exceeds an amount necessary for the performance of the program activities under the contract agreement.

4.4.3 Equipment and Supplies

- "Equipment" is defined by federal and state regulation as an item of non-expendable, tangible personal property, having a useful life of more than one year and an acquisition cost which equals or exceeds a unit cost of \$5,000.
- Purchases less than \$5,000 are considered supplies and are further defined as "office supplies" or "field supplies".
 - "Office supplies" are those articles ordinarily found in an office environment which are necessary to conduct everyday business, including paper, copiers, notebooks, furniture, chairs, phones, envelopes, etc.

- “Field supplies” are those items that are instrumental in the weatherization of a home, including blower door equipment, infrared cameras, gas meters, smoke detectors, moisture meters, borescopes, tape measures, circular saws, building supplies, etc.
- All equipment and supplies are the property of the WAP and are not considered to be the property of the Subgrantee.
- Subgrantee shall receive prior, written approval from the Grantee before making any equipment purchases.
- Office supplies costing less than \$500 unit cost are exempt from inventory tracking.
- Field supplies costing less than \$100 are exempt from inventory tracking requirements.
- All supply and equipment purchases must be made in accordance with Subgrantee’s procurement standards.

A “unit” generally includes an individual item but may also be an aggregation of items needed for the unit to actually function. The primary example of an aggregated unit is a computer system, which requires a central processing unit, a keyboard, a monitor and a printer to be useable.

In the event that a Subgrantee’s contract with the Grantee is not renewed, or terminated for any reason, field supplies and equipment purchased with Program funds must be returned to the Grantee as property of the WAP.

4.5 ALLOWABLE EXPENDITURES

WAP funds may only be expended for approved activities to accomplish the purposes of the Program. Program funds shall be expended and charged according to cost categories defined in this section and as required in any contract between the Grantee and Subgrantees. Where inconsistencies might exist between these policies and procedures and contracts between the Grantee and the Subgrantees, the contract provisions shall prevail.

Funds available to the Subgrantee are limited to the total contract amount. The Subgrantee is solely responsible for any expenditure in excess of the total value of the contract.

4.5.1 Cost Basis for Determining Cost Allocations

Overall agency costs that cover a range of programs must be assigned using a reasonable formula to figure how much to charge each program. Most agencies split overall agency administrative costs among programs based on a cost allocation plan or cost basis, using time studies of the employees involved or other justifiable methods. Rent, phones and utilities are good examples of costs that need cost basis calculations to be performed.

Specific costs may be allocated to the WAP if they are treated consistently with other costs incurred for the same purpose in like circumstances and if they:

- Are incurred specifically for the purposes and benefit of the Subgrantee;

- Can be distributed in reasonable proportion to the benefits received by the program; and,
- Are necessary to the overall operation of the organization, although a direct relationship to any particular cost objective cannot be shown.

The Subgrantee must be able to demonstrate a valid basis for administrative charges to the WAP, and shall include cost basis calculation in their files and make such calculations available for monitoring.

4.5.2 Administrative Cost Category

Administrative costs are costs associated with those functions of a general nature not clearly specific to one program but applied to a range of the Subgrantee's programs; salary and fringe costs for individuals such as directors, fiscal staff, legal staff, and so forth. Personnel functions such as agency planning, budgeting, accounting, and activities that establish and direct the Subgrantee's policies, goals, and objectives overall, are usually considered administrative costs. Other administrative costs include amounts paid for rent, phones, copying, postage and other charges of a general administrative nature.

4.5.3 Insurance Cost Category

Subgrantees must carry liability insurance and must require the same of their subcontractors. Liability insurance required by the DOE and the Grantee may be charged to the WAP grant at the actual, direct cost. Liability insurance is neither a part of the administrative costs nor the program operations costs.

Regular liability insurance policies do not generally provide coverage for many health and safety circumstances which the WAP encounters. For example, liability may not extend to such hazards as lead based paint or asbestos. DOE has mandated that additional Pollution Occurrence Insurance coverage is required of the Subgrantee if their current policy does not specifically cover such liability.

4.5.4 Fiscal Audit Cost Category

The actual cost of the fiscal audit may be charged to the WAP grant as a direct cost. The fiscal audit is not considered a part of administrative costs or program operations costs. In the event that more than one program is being audited, the cost to the WAP is to be allocated on a reasonable basis and the cost basis shall be made available to the Grantee upon request.

4.5.5 Program Operations Cost Category

Program Operation costs are identifiable with the Subgrantee's weatherization operations. Such costs include the Subgrantee's direct costs as well as all of the Subgrantee's costs associated with the weatherization subcontractors.

Staff costs directly associated with the WAP are considered Program Operations expenditures. Where employees work on multiple activities, their costs are to be allocated based on a reasonable method and adequate documentation of their activities across programs. Timesheets are required of all WAP employees or any employee engaged in WAP activities and for which reimbursement is requested.

Operational expenses in support of the WAP at the Subgrantee level are allowable program operations expenses and would include rent and utilities, program advertising, supplies consumed by the program, as well as office equipment, furnishings, and computer equipment used in the program. Program support charges must be made using the actual, net cost to the program. Some operational expenses (phone, rent, etc.) can be considered either Program Operations or administrative expenses, but must be clearly defined and have a cost allocation basis on file.

The total cost of the subcontractor's work on a weatherized unit is considered a Program Operations cost and is to be assigned in total by the Subgrantee to that line item. This includes all subcontractor invoices for labor and overhead, as well as the bill for materials and parts used in the job.

Equipment purchase by a Subgrantee is another allowable Program Operations expenditure; however, equipment costs may be allocated to a different cost category (e.g., Subgrantee administration, Subgrantee T&TA), depending upon the use and purpose of the equipment.

4.5.6 Vehicle Cost Subcategory

The cost of a vehicle for weatherization program use is not a Program Operations expense, and is a standalone direct cost category for the program. The cost of fuel, maintenance, repairs, and vehicle insurance should, however, be categorized and charged as Program Operations expenses.

Vehicles may be purchased outright or leased, and should be amortized over its expected life. The annualized share should then be charged to each unit completed in the period as a part of the average cost per unit.

When deciding whether to lease or purchase a vehicle, the Subgrantee must compare the cost of each method to determine the most cost effective course to follow. All vehicle purchases and leases require prior approval by the Grantee and DOE (if DOE funds are used).

Subgrantees must follow the proper competitive procurement method to obtain a vehicle.

4.5.7 Health and Safety Expenditures

Delaware budgets health and safety costs as a separate category, thereby excluding these costs from the average cost per unit calculation. Creating a separate budget category also allows these costs to be isolated from energy efficiency costs during program evaluations and designated as health and safety measures (HSM).

Health and safety expenditures shall be tracked separate from any other program costs and shall be reported on monthly expenditure reports.

4.5.8 Training and Technical Assistance (T&TA) Expenditures

T&TA funds are budgeted separately from other budget categories and are to be used for training grantee staff, Subgrantee staff and subcontractors or for other allowable T&TA activities or purchases.

All training must be approved by the Grantee, in advance. Approval from the Grantee may be sought by the Subgrantee with the submission of a training plan at the start of a contract year. Alternatively, the Subgrantee may submit specific requests anytime over the course of the year.

Whether technical or administrative, training must be demonstrably relevant to the WAP to be approved for payment with T&TA funds.

The Grantee and/or the Subgrantee may require weatherization contractors to cover their own training expenses, depending on the training needed, the location, and any travel costs or other considerations as determined by the Grantee.

Training may take the form of classroom or field training, and may be on one or more topics related to weatherization fieldwork, administration, fiscal operations or any operation directly related to weatherization efforts.

Conference or workshop registration fees required for attendance at an approved weatherization training event are allowable T&TA expenses. Where meals (including continental breakfasts) are included as part of a conference program, no additional meal expenses will be allowed for that particular meal.

4.5.9 Travel

Travel is also an allowable training expenditure. Specific expenditures may include: mileage, car rental, airfare, lodging, meals and incidental expenses.

Travel costs may not exceed the federal per diem rates for lodging, meals and incidental expenses for the travel destination as found on the <http://www.gsa.gov/perdiem> website.

To qualify for reimbursement for lodging, food or other travel expenses, the traveler must be spending the night more than fifty miles from his/her station.

All reimbursements for travel expenses require original itemized receipts for all travel expenses. Reimbursements are made for actual documented expenses as determined by receipts. Under no circumstance will the cost of alcoholic beverages be reimbursed.

The Subgrantee has the responsibility to fully document T&TA expenditures in accordance with the Grantee requirements.

4.5.10 Subgrantee Uniforms

The Subgrantee and contractors may use the weatherization logo in a responsible manner. Delaware WAP will not pay for any clothing, uniforms, marketing materials or other paraphernalia used by contractors in the Program. If a Subgrantee wishes to purchase uniforms or other articles of clothing for the WAP for use by the Subgrantee staff, they must first submit a “uniform policy” for review and approval by the Grantee. The policy must state why the clothing is needed, when it is to be worn, by whom it is to be worn, and a budget for uniform expenditures. **No funds will be reimbursed without an approved uniform policy approved in advance of any uniform expenses.**

4.6 INCIDENTAL REPAIRS

WAP Federal regulations found in 10 CFR 440.3 define Incidental Repairs as “those repairs necessary for the effective performance or preservation of weatherization materials. Such repairs include but are not limited to, framing or repairing windows and doors which could not otherwise be

caulked or weather-stripped; and providing protective materials, such as paint, used to seal materials installed under this program.” US Department of Energy Weatherization Program Notice (WPN) 12-09 provides additional guidance, noting that WAP is not a rehabilitation or general repairs program. Program policies strictly prohibit roof replacement, structural repairs, or other non-energy related rehabilitation work. Units requiring this type of repair should be referred to a rehabilitation program or the Subgrantee must use other sources of funds to cover these costs.

Incidental repairs must be justified in the client file with an explanation for their need and relationship to a specific energy conservation measure (ECM) or group of ECMs. WPN 12-09 states, “For each weatherized building, the cost of the total package of ECMs, added to the cost of all IRMs for the building, must have a calculated SIR of 1.0 or greater.” WPN 12-09 provides a table of example Ancillary Items, IRMs, and Health and Safety Measures for reference and comparison and a FAQ is provided with the WPN that answers many specific questions regarding IRMs, specifically those related to roof patching, vapor barriers, attic ventilation, manufactured home belly repairs, furnace work, and window replacement. The Subgrantee should review this guidance, in addition to administering review procedures for ensuring work quality and cost effectiveness, prior to authorizing the installation of any IRMs.

For priority audit weatherization units, Delaware WAP establishes a per-unit IRM cost limitation in its annual plan. In the case that one or more IRMs are installed by a subcontractor that may affect the pre-weatherization CFM50 value as measured by the auditor (i.e., repairs to the unit’s pressure boundary), the Subgrantee must establish a new pre-weatherization CFM50 using their own certified technical staff person for the purposes of ensuring that the installation of IRM(s) will not result in “double-billing” for measured infiltration reduction in the unit.

4.7 HEALTH AND SAFETY POLICIES

Health and safety of our WAP clients and workers is of paramount importance. The Grantee is required to develop a Health and Safety Plan each year to govern the operations of the WAP. The current Health and Safety Plan is attached at Appendix B.

The Subgrantee is required to adhere to the provisions of the Health and Safety Plan at all times. Regular training must be given by the Subgrantee to the Subgrantee staff and weatherization contractors to ensure that all parties are educated on the Health and Safety Plan. Questions concerning the applicability of health and safety guidelines should be addressed to the Grantee WAP Manager.

4.8 SUBGRANTEE REQUEST FOR REIMBURSEMENT

All requirements listed below must be completed, as applicable, in order to ensure approval and payment by the State. If any of these requirements are not met, the State may return the invoice for corrections, which may significantly delay invoice payment. In all cases, the Subgrantee should make all effort to complete sufficient activities and provide the documentation needed to classify the unit as weatherized.

4.8.1 General Requirements

1. A single invoice with a unique invoice number must be submitted for each completed or closed weatherization unit. All costs for a completed unit must be included on a single invoice. Invoices must include documentation for all weatherization activities completed for the unit.

2. Invoices for Subgrantee administration and program operations expenses not associated with individual units may be submitted no more frequently than every two weeks. Monthly invoices are preferred.
3. The invoice and each piece of supporting documentation must be filled out completely, dated, and signed. Incomplete forms and undated/unsigned forms are not acceptable, and will be returned to the Subgrantee.
4. All invoices shall provide accurate cost categories and arithmetically correct totals on the invoice cover sheet;
5. No claim may be submitted for weatherization work until such time as Subgrantee has performed the Final Inspection and provides a document verifying the Final Inspection.
6. No claim may be submitted for additional weatherization work conducted after a unit has passed the Final Inspection unless approved in advance by the Grantee.
7. No claim may be submitted for weatherization work which is outside of the measures set forth by the Subgrantee Work Order, without a prior, written modification of that order.
8. If the Subgrantee uses their own staff to conduct energy audits or Final Inspections, the invoice should reflect no charge for those services as those salary costs are already covered under program operations.
9. The Grantee will review and process the invoices within two weeks of receipt from the Subgrantee.
10. Incomplete or defective invoices will be returned to the Subgrantee within five (5) business days following receipt.
11. Invoices that are deemed defective by the Grantee shall be resubmitted within ten (10) business days;

4.8.1.1 Invoice Cover Sheet

4.8.1.1.1 Basic Invoice Information: Each invoice cover sheet must display the required information and appropriately categorized itemized charges as required by this Manual. In addition, invoice cover sheets for individual weatherization units must be dated, signed by the Subgrantee, and must display the client reference number and client name.

4.8.1.1.2 Invoice Items List: Each invoice cover sheet must separately list the weatherization costs (including no cost items) related to the weatherization activities completed for the subject unit and must identify the contractor that completed each activity, including:

- Energy Audit/Inspection of Prior Weatherization Work
- Deferral (If applicable)
- Weatherization Construction (Program Operations)
- Health and Safety expenses
- Mechanical/HVAC (If applicable)
- Final Inspection
- Second Final Inspection (If applicable)

4.8.1.2 Completed Unit Supporting Documentation

Contractor Invoices: Each invoice for a completed unit must be accompanied by copies of the invoices and related documentation submitted to the Subgrantee by contractors for weatherization activities, as indicated on the invoice cover sheet. These invoices must be reviewed by the Subgrantee to ensure that invoice documentation accounts for all work and it is appropriately categorized on the supporting documentation.

1. Energy Audit/Inspection of Prior Weatherization Work
2. Weatherization Construction (Include the work order, all pages of the itemized price list, NID sheet, and copies of all receipts for installation materials on the NID)
3. Mechanical/HVAC (If applicable) (Include copies of all receipts for installation materials)
4. Final Inspection
5. Second Final Inspection (If applicable)

Energy Audit Report: This document must indicate the date that the energy audit was performed and must include complete audit information, including Energy Auditor name, energy audit data, and appropriate pre-weatherization blower door data. The form must be filled out completely. The form must include the printed name of the Energy Auditor/inspector and must be dated and signed by the Energy Auditor/inspector.

Work Order: If the energy audit report indicates the need for the installation of weatherization measures or health and safety measures, each measure to be installed must be listed on this form in order based upon the State Priority list. The form must be filled out completely. The form must include the printed name of the person who completed the form and must be dated and signed.

Final Inspection Report: This document must indicate the date that the inspection was completed, the name of the inspector, and must include both an indication of “pass” or “fail” for each inspected item (with applicable explanations for failure) and an indication of “pass” or “fail” for the inspection as a whole. The form must be filled out completely. The form must include the printed name of the Energy Auditor/inspector, must be dated, signed by the Energy Auditor/inspector, and provide the Energy Auditor/inspector’s valid Building Performance Institute (BPI) Quality Control Inspector (QCI) number as applicable.

Second Final Inspection Report: If a second Final Inspection is required, this document must indicate the date that the inspection was completed, the name of the inspector, and must include both an indication of “pass” or “fail” for each inspected item (with applicable explanations for failure) and an indication of “pass” or “fail” for the inspection as a whole. The form must be filled out completely. The form must include the printed name of the auditor/inspector, must be dated, signed by the auditor/inspector, and provide the auditor/inspector’s valid Building Performance Institute (BPI) Quality Control Inspector (QCI) number as applicable.

4.8.1.3 Deferred Unit Supporting Documentation

Auditor Invoice: In the event that the Subgrantee does not conduct the energy audit, each invoice for a closed weatherization unit must be accompanied by a copy of the Subgrantee invoice for the energy audit, inspection, and/or deferral.

Deferral Form: This document should be filled out completely. The form must include the printed name of the Energy Auditor/inspector and must be signed and dated by both the Energy Auditor and the client.

Deferral Letter: Each invoice for a closed weatherization unit must include a copy of the letter sent to the client informing them of the deferral.

Energy Audit Report: If the deferring Energy Auditor completed a partial or full energy audit on the unit prior to its deferral, the invoice must be accompanied by the completed or partially-completed report. The form must include the printed name of the Energy Auditor/inspector and must be dated and signed by the Energy Auditor/inspector.

4.8.2 Subcontractor Invoices

In order to substantiate the Subgrantee's claim each subcontractor invoice must include:

1. Subcontractor name, address, phone and contact information
2. Work Order Number assigned to the unit by the Subgrantee
3. Physical address of the unit
4. All dates that the company worked on the unit
5. Name of the Crew Leader on the job
6. A copy of the original approved Work Order and any change orders approved by the Subgrantee.
7. Breakdown by weatherization measure of costs for labor on the unit
8. Breakdown by weatherization measure of costs for materials, parts or other costs on the unit
9. Breakdown of all NID items, showing material and labor costs (only if not on the Price List)
10. Invoice total
11. Original receipts for all materials purchased and being billed by the company for any item not on the Price List and included on the NID form
12. Other information or documentation required by the Subgrantee or the Grantee
13. Signature of authorized company employee

Subcontractors shall submit invoices within five (5) days of from the Final Inspection.

4.8.3 Payment of Claims

Subgrantee claims shall normally be made on a reimbursement basis, however, an advance payment may be made to the Subgrantee by the Grantee for expenditures in accordance with Section 4.9 of this WAP Manual.

1. Claims payment will be made by the Grantee to the Subgrantee within thirty (30) days of the receipt of a valid claim.
2. The Grantee may withhold full or partial payment of claims under several circumstances. The Subgrantee will be notified prior to funds being withheld and given an opportunity to address the underlying issue, during which time the claim will be held.
3. The Grantee may withhold payment to a Subgrantee if a claim submitted by the Subgrantee is inaccurate, incomplete or unsubstantiated; or if the Subgrantee has not otherwise complied with the claim preparation instructions issued by the Grantee.

4. The Grantee may withhold payment to a Subgrantee in instances of incorrect, inappropriate or unsubstantiated costs that have been discovered through the Grantee fiscal or programmatic monitoring. Payment may be withheld for expenditures that have been disallowed in an energy audit of Subgrantee weatherization funds.

4.8.4 Final Claims

No later than sixty (60) days following the conclusion of the contract period, the Subgrantee will submit its final claim under the contract, in a manner and format specified by the Grantee.

The final claim will include all remaining expenditures under the contract for the period. This means that all units weatherized in the period must be completed within the contract period, including having passed Final Inspection, in order to be claimed.

The total final claim must be offset either by the Subgrantee or by the Grantee with credits for:

1. Any amount received by the Subgrantee in excess of the total contract.
2. Any amount received by the Subgrantee which exceeds a budgetary limit on a specific line item.
3. Any amount which will cause the agency to exceed the allowable average cost per unit over the period of the contract.
4. Any outstanding balance on advance funding received by the Subgrantee on the contract.
5. Subgrantee settlement of disallowed costs found in an energy audit.
6. Any other amounts as determined between the Subgrantee and the Grantee.

4.9 ADVANCE FUNDING

1. The Grantee may advance funds to the Subgrantee at the inception of any contract year and as needed at any time during the term of the contract. The authorization to advance funds is provided at 2 CFR Part 200 "Advance Payment".
2. The Subgrantee shall not use advanced funds for any costs other than eligible WAP expenditures in accordance with the requirements of the funding source from which they are provided, or as otherwise authorized in writing by the Grantee.
3. Advance funding requests shall be in writing and include a plan for how the advance will be used and a justification for the amount of advance requested. If justified, the Grantee also limits such requests to no more than 10% of the total initial contract amount.
4. After receiving the advance, the Subgrantee shall use it as "working capital" as authorized in writing by the Grantee in its approval of the advance.
5. The Subgrantee shall keep detailed records of each invoice or expense where advance funds are used, and shall provide those records to the Grantee upon request. Prior to the end of the contract's term, or at any time during the contract period, Subgrantee may elect to return an advance of funds in one of two ways: as a lump sum payment to the Grantee; or, by deducting from Subgrantee's claims for payment an amount equal to the original advance. Should a funding advance balance exceed the final claim at the close

of the Agreement, Subgrantee shall reimburse the Grantee by direct payment of the remaining balance of the advance within 10 days of the termination of the contract.

6. The Grantee will monitor the use of any Funding Advance. If the Grantee determines that any portion of the funding advance is used improperly or in violation of the Grantee's approval of the advance, the Grantee may require the immediate return of the Funding Advance and Subgrantee shall immediately but, in no case, more than 7 days after the written demand repay the full outstanding balance of the Funding Advance.
7. Subgrantee shall deposit and hold any advances in an interest-bearing account, with interest treated under applicable federal regulations, such as 2 CFR 200.

4.10 CLIENT FILES

The Subgrantee is responsible for maintaining a complete and separate file on each family whose application is moved from the waiting list to a determination of eligibility for services. All paperwork must be labeled with the unique identification number of the client assigned by the Subgrantee. In lieu of hard copies, the Subgrantee must be able to show all documentation in a digital format or database.

For eligible cases, receiving weatherization benefits, case files should include all forms, notes, correspondence and documentation regarding the eligibility of the unit, the client's eligibility for services, and case notes. Files are required to be open for inspection by the Grantee or state or federal monitors during normal business hours, otherwise client files are not for review by the general public and release of any information in files is governed by federal and state Freedom of Information Act and any specific Program rules or guidance from the Grantee and/or DOE.

4.10.1 WAP On-Line Hancock database

The Grantee operates the Delaware WAP On-Line database, a product of Hancock Software Solutions for tracking WAP clients through the weatherization process. The Subgrantee is required to utilize the WAP On-Line database in all instances where the Grantee has authorized its use and has provided training.

4.10.2 Case Eligibility Documentation

A typical case file will include:

- A completed application for the Weatherization Assistance Program
- Copies of *all* documents used to verify the income of the household
- Copies of all correspondence related to the case, including a copy of the notice of eligibility
- A copy of the head of household's picture identification and social security card
- Copies of all other adult household members' Social Security cards
- Proof of citizenship as per the LIHEAP guidelines
- Copies of all documents used to verify ownership of the unit
- Copies of all documents used to verify tenancy of the unit
- Utility consumption data, as applicable

- Homeowner Consent Form
- Landlord Release Form (if applicable)

4.10.3 Weatherization Services Documentation

All information related to the weatherization services must also be documented in the case files. A typical file will include:

- Unit address and owner contact information
- Energy Audit on the unit with pre weatherization readings and prioritized measures
- Auditor sketches or other diagrams
- Master work order
- Contractor's supplemental bid sheet(s), as applicable
- Modifications or change orders to the work order
- Subcontractor's documentation such as ongoing pressure diagnostic readings
- Subcontractor invoices showing all material and labor charges
- Health and safety documentation
- ASHRAE 62.2 Disclosure form
- Completed client education information
- Receipts from client verifying the issuance of required pamphlets such as the information on lead based paint
- A summary of completed work
- Copies of all invoices, Price Lists or other documents used to seek re-imbursement
- The total cost of the unit subtotals for weatherization cost categories
- The completed Final Inspection report including documentation of post weatherization readings
- SHPO form
- Priority List "Skipped Items" document or notation in Hancock software
- Photographs (stored in the Hancock software or the WAP Dropbox account)

4.10.4 Denied Case Documentation

Denied cases are to be maintained also, but kept separate from eligible cases. A typical denied case file will include:

- A completed application for the Weatherization Assistance Program
- Copies of *all* documents used to verify the total yearly income of the household
- Copies of all correspondence related to the case, including a copy of the notice of denial (or deferral)
- A copy of the head of household's picture identification and social security card
- A written determination of the household's ineligibility
- Documentation used to determine ineligibility
- Written case notes as applicable
- Documentation related to a denied applicant's appeal, as applicable
- Notice to appellant regarding all appeal decisions
- Copy of further appeal to the Grantee, as applicable
- Copy of the Grantee decision on the appeal, as applicable

4.11 FISCAL AUDIT

No less than once per year, or at the time of expiration and/or termination of the Grantee's contract with the Subgrantee, the Subgrantee must have a fiscal audit of weatherization funds conducted by an independent or certified public accountant. The fiscal auditor must be selected by the appropriate competitive process. The same auditing company may not be used to audit weatherization funds for more than three (3) consecutive contract years.

The audit may be a part of an agency-wide audit or an individual audit of weatherization funds. It is to be performed in accordance with all directives provided by the Grantee or the State of Delaware, as well as the applicable provisions of the OMB Circular A-133, entitled "Audits of States, Local Governments, and Non-Profit Organizations".

The complete, actual audit report is to be submitted to the Grantee by the Subgrantee within thirty (30) days of the receipt of the completed audit, or the receipt of a notice from the auditor that the audit cannot be completed. The reason(s) for an incomplete audit must be stated clearly by the fiscal auditor and the Subgrantee.

The Grantee will review the audit for material problems with the accounting systems of the agency, questioned costs and disallowed costs. The Subgrantee will be required to submit a written plan for corrective action of findings, within a time frame set by the Grantee. Follow-up on the corrective action will be monitored in the Grantee's Annual Administrative Review report of the Subgrantee.

Disallowed costs will be addressed in a demand for repayment to the Grantee. The demand will detail the specific amounts to be returned by the Subgrantee. If the funds are not refunded within sixty (60) days of the notification letter the next available Subgrantee claim(s) will be offset by the amount of the disallowance.

4.12 INSURANCE REQUIREMENTS

4.12.1 Subgrantee Requirements

The Subgrantee shall maintain the following insurance during the term of any contract with the Grantee:

- Worker's Compensation and Employer's Liability Insurance in accordance with applicable law, and
- Comprehensive General Liability - \$1,000,000.00 per person/\$3,000,000 per occurrence, and
- Pollution Occurrence Insurance - \$1,000,000 per occurrence
- Product Liability - \$1,000,000.00 per person/\$3,000,000 per occurrence.
- VENDOR shall provide forty-five (45) days written notice of cancellation or material change of any applicable insurance policies.
- Subgrantee shall provide the Certificate of Insurance to the Grantee before commencing any weatherization work

4.12.2 Subcontractor Requirements

Subcontractor shall provide and maintain comprehensive general liability insurance coverage with minimum \$1,000,000 combined single limit and aggregate limits of \$1,000,000 for bodily

injury and property damage, and worker's compensation and unemployment compensation in amounts required by state law. Before commencement of any work, Subcontractor shall furnish to the Subgrantee true and correct copies of the Certificates of Insurance maintained in compliance with this section that illustrate the types of coverage, limits of liability, expiration dates of policies and that such policies are in full force and effect. In the situation where the Grantee has approved that a contractor can hire portions of work to a subcontractor, the contractor is responsible to verify that their subcontractors are covered under the insurance requirements held in this WAP Manual.

When expressed, written permission is given by the Grantee for a contractor to subcontract portions of their weatherization work, the contractor must ensure that the subcontractors adhere to all of the federal, state, and Program requirements.

5. PROGRAM PERSONNEL AND TRAINING

5.1 WORKMANSHIP

Weatherization work must meet the workmanship standards established by the Program and detailed in this Manual and the WAP Quality Work Plan. Program standards and protocols in this manual may be altered by subsequent Delaware Program Updates which take precedence.

Workmanship standards include the:

- Use of qualified and trained personnel to conduct weatherization work;
- Use of generally accepted weatherization protocols, methods, techniques and tools;
- Installation of prescribed materials, parts and equipment; and,
- Weatherization work conducted in a safe and healthy work environment.

In addition to this manual, DOE cites numerous sources for weatherization work standards in the federal regulations at 10 CFR 440, Appendix A: “Standards for Weatherization Services”.

The Subgrantee must contractually require its subcontractors to comply with the Program workmanship standards. Jobs and job sites should be monitored to ensure that the subcontractor is complying with the standards.

5.2 WEATHERIZATION PERSONNEL

The weatherization work must be completed by actual employees of the subcontractor. The subcontractor may not further subcontract work without specific, express permission by the Subgrantee and the Grantee. The subcontractor is to employ an adequate number of properly trained and supervised workers to accomplish the work.

Subcontractors completing shell work must have a qualified Crew Leader at the work site at all times.

In conducting weatherization work the subcontractors must comply with all state and local licensing requirements. Skilled workers such as HVAC technicians, electricians and plumbers must hold all valid, required credentials.

Energy Auditors are required to have a valid, current BPI Building Analyst certification. Energy Auditors will also be required to attend additional training as required by the Grantee.

Compliance with other federal regulations regarding employee qualifications is also a requirement. For example, under certain circumstances lead-safe work must be completed under the supervision of a Delaware Certified Renovate/Repair/Paint person that is employed by a company that has Firm Status.

The Subgrantee must contractually ensure that its weatherization subcontractors comply with these requirements. The compliance should be verified and monitored by the Subgrantee on a sample of individual jobs.

For scrap metal pick-up, provided material is not on the premises (not including a 10 foot strip adjacent to the roadway or “at the curb”), scrap metal dealers/laborers are not required to be trained by WAP. Any scrap metal laborers working on the property or in the home shall be staff of the subcontractor or otherwise successfully completed all relevant training courses.

5.2.1 Energy Auditor & Inspector

Energy Auditors play a critical role in the weatherization process and provide basic skills and activities central to the home energy audit itself, including pressure diagnostics, mechanical systems, insulation, client education, lead safe weatherization and health & safety. All Energy Auditors must have successfully completed the Home Energy Professional Building Analyst Training and acquired certification. An Energy Auditor who is qualified to perform a Final Inspection at a weatherization unit under the WAP, and in accordance with DOE requirements, must possess a valid Home Energy Professional Quality Control Inspector certification. This applies to all individuals who perform an evaluation and sign off on work performed in homes, including final inspectors and Grantee monitoring staff. It is also required that the Energy Auditor or Grantee monitoring staff maintains a valid QCI certification. In some circumstances, an Energy Auditor that does not have the QCI certification may perform a Final Inspection on homes that are not federally-funded units. These circumstances are not the norm, and only used in times when staff is not able to provide state-wide QCI inspections. These Final Inspections must be clearly identified on the client invoice sheet.

5.2.2 Weatherization Crew Leader

The Crew Leader supervises a crew of installers on-site, weatherizing the unit. The supervision on the weatherization job is a significant part of the subcontractor’s responsibilities. In instances where lead safe work practices are called for, the Crew Leader will also fill the required role of the RRP. The Crew Leader is responsible for the work ordered on the job and the installation crew.

5.2.3 Weatherization Installers

Weatherization installers conduct the work necessary to air seal, insulate and conduct other needed improvements, repairs and other activities within the home.

5.2.4 Weatherization Installers – Manufactured Homes

Weatherization workers conducting work in manufactured homes are a specialized part of the weatherization process and require specialized skills above and beyond normal weatherization installer activities. The core competencies are the same, but their application to the special practices involving manufactured homes requires specialized training.

5.2.5 HVAC Technician

HVAC subcontractors have the specialized knowledge needed for working on heating units and other HVAC equipment under the WAP. Their activities are limited to installation and repair of HVAC and water heating equipment.

5.2.6 Separation of Energy Audit and Final Inspection Duties

In the case of performing Final Inspections, in no instance may the QCI be employed by, or represent the company that has performed the weatherization installation work on a given unit.

5.2.7 Core Competencies

5.2.7.1 Definitions

Competency means the possession of a minimum level of knowledge and proficiency required to collect appropriate information, make informed decisions, and physically takes the needed actions to deliver the high-quality weatherization service.

Possess a working knowledge of means to:

- a. Know how a particular topic affects the weatherization process;
- b. Have the relevant information committed to memory or be able to locate it in readily available sources; and
- c. Use this knowledge to make informed decisions and guide weatherization work.

Demonstrate the ability to means to physically conduct a test, procedure, or technique on an actual house, a prop, or in a training laboratory in the presence of someone qualified to assess the particular competency.

5.2.7.2 Safe Work Practices

All Energy Auditors and Inspectors, HVAC Technicians, Crew Leaders, Weatherization Technicians, and RRP certified individuals must exhibit safe work practices by possessing the following competencies. In the event that there is a new hire on a weatherization job site, it is the responsibility of the contractor to oversee their work. Any job tasks assigned to the new hire must be properly explained and training provided. Until the new hire can acquire the formal training, a log must be kept on the job site showing the training provided, date provided, and a signature of the new hire verifying receipt of the training.

5.2.7.2.1 Possess a working knowledge of:

5.2.7.2.1.1 DOE WAP regulations/policies and Environmental Protection Agency (EPA) guidelines for asbestos, lead, mold, and other health hazards;

5.2.7.2.2 Safety Data Sheets; and

5.2.7.2.3 Occupational Safety and Health Administration (OSHA) standards:

- Ladder safety;
- Fall protection;
- Personal protective equipment;
- Respiratory protection;
- Motor vehicles;
- Power-operated hand tools;
- Fire prevention;
- Permit required confined spaces;
- Other worker related OSHA standards.

Demonstrate the ability to:

1. Select, fit, and use the appropriate personal protection equipment for a particular task;
2. Safely use basic hand and power tools;
3. Use a basic first aid kit to treat common job-site injuries;
4. Implement lead-safe practices;
5. Identify mold conditions; and
6. Assess work area safety hazards.

5.2.7.3 Energy Auditor/Inspector Competencies

5.2.7.3.1 Prerequisites

1. BPI certification as a Building Analyst
2. Possess Safe Work Practices, Weatherization Technician, and Crew Leader competencies;
3. Possess a working knowledge of building science principles; and
4. Have a working knowledge of personal computers and general software applications.
5. Knowledge and experience with the Delaware Field Guide, Delaware Standard Work Specifications, and the WAP Manual;
6. Knowledge of and access to relevant local codes.

5.2.7.3.2 Inspection and Measurement

Possess a working knowledge of:

1. Delaware Weatherization Standards;
2. Air and heat flow in buildings;
3. Factors that affect building heat loss;
4. Construction features and critical junction points of common housing types;
5. Insulation R-values;
6. Different insulation materials and installation techniques;
7. Various air-sealing techniques and appropriate materials;
8. Causes of and remedies for existing and potential moisture problems;
9. Causes of and remedies for other existing and potential indoor air quality problems;
10. Residential heating systems (HVAC ducted and hydronic systems);
11. Residential mechanical ventilation systems;
12. Building Tightness Limits based on the appropriate ASHRAE 62 standard; and
13. Electric and fossil fuel baseload usage.

Demonstrate the ability to:

1. Measure the dimensions of floors, walls, ceilings, windows, and doors, and compute surface areas;
2. Compute the volume of conditioned space of a building;
3. Define the thermal envelope of a building;
4. Define the pressure boundaries of a building;
5. Assess the effectiveness of existing insulation and the effective R-values; and
6. Analyze utility bills including breaking out baseload usage for heating and cooling usage;
7. Diagnostic Testing;
8. Blower door:

Possess a working knowledge of:

1. Principles of air movement and how they relate to building heat loss;
2. Typical air leakage problems in common housing types; and
3. Minimum ventilation rates.

Demonstrate the ability to:

1. Set up a blower door;
2. Prepare a building for a blower door test; and
3. Take blower door reading and interpret results.

5.2.7.3.3 Zone pressure diagnostics

Possess a working knowledge of:

1. The air barrier or pressure boundary of a building and the importance of aligning it with the thermal barrier; and
2. Primary and secondary zones of a house.

Demonstrate the ability to:

1. Conduct zone pressure diagnostics and interpret results;
2. Determine the location and effectiveness of the air barrier of a house.

5.2.7.3.4 Duct testing

Possess a working knowledge of:

- Problems associated with different types of duct leakage.

Demonstrate the ability to:

1. Determine dominant duct leakage;
2. Conduct pressure pan tests; and
3. Seal duct leaks with appropriate materials and good workmanship.
4. Measure room pressure imbalances in houses with forced-air systems.
5. Steam and hot water distribution system testing;

Possess a working knowledge of:

- The components of typical steam and hot water distribution systems and the characteristics of their proper operation.

Demonstrate the ability to:

1. Test air vents, steam traps, thermostatic radiator valves, and hot water zone valves; and
2. Estimate the energy impacts of existing overheating problems.

5.2.7.3.5 Baseload systems

Demonstrate the ability to:

- Meter electrical devices to determine their annual energy consumption.

5.2.7.3.6 Combustion Appliance Safety

Possess a working knowledge of:

1. CO action levels;
2. Common code requirements related to:
3. Vent system sizing, materials, clearances, and installation;
4. Safety shut-off devices;
5. Gas line sizing; and
6. Combustion air.
7. Causes of and remedies to common vent system problems.

Demonstrate the ability to:

1. Measure the CO level in ambient air;
2. Measure the CO level of vented and unvented combustion appliances;
3. Measure the CO levels of gas- or propane-fired cook stove oven bake burners;
4. Understand the difference between as-measured and air-free CO readings;
5. Detect any natural gas, propane, and fuel oil leaks;
6. Conduct a worst-case draft test of a combustion appliance zone;
7. Measure the CAZ to assure sufficient volume for combustion air;
8. Clock a gas meter to determine the actual input of a gas-fired combustion appliance;
9. Conduct basic temperature-rise and static-pressure-drop tests on forced-air furnaces;
10. Measure the steady-state efficiency of a vented combustion appliance; and
11. Assess the potential inadequacy of supply and return plenum and duct sizes for forced-air systems.

5.2.7.3.7 Energy-Saving Measures

Possess a working knowledge of:

1. What materials are allowed to be installed based on DOE 10 CFR 440 Appendix A;
2. The DOE-approved processes (Priority Lists and/or software); and
3. The interaction between typical weatherization measures (e.g., the impact of air-sealing and insulation measures on the potential savings of heating efficiency improvements).

Demonstrate the ability to:

1. Use DOE-approved processes (Priority Lists or software) to select appropriate, cost effective weatherization measures;
2. Prioritize air-sealing efforts;
3. Estimate the heating and/or cooling load of a dwelling to ensure proper equipment sizing if the heating or cooling system is to be replaced;
4. Select the proper CFL to replace an incandescent lamp while maintaining or improving lighting levels; and
5. Meter an existing refrigerator or locate its DOE tested usage in a database to estimate annual energy consumption.

5.2.7.3.8 Work Scope Development

Demonstrate the ability to:

1. Accurately estimate the type and quantity of materials required to cost effectively weatherize an eligible dwelling unit; and
2. Prepare clearly written work orders for work crews or contractors.
3. Verify that the weatherized house is safe by conducting all appropriate combustion appliance safety tests;
4. Evaluate the appropriateness of the installed weatherization measures taking into consideration appropriate program regulations, policy, energy audit results, and/or priority lists;
5. Assess whether the measures were installed with good workmanship, proper materials, and in such a manner to comply with local codes and ensure long-term energy savings over the life of the measures;
6. Ensure that all measures charged to the job were actually installed; and
7. Verify the effectiveness of air sealing efforts by conducting a blower door test and zone pressure diagnostics.

5.2.8 Weatherization Crew Leader Competencies

Personnel that supervise field workers such as Installers must possess the following competencies:

1. Possess Safe Work Practices and Installer competencies.
2. Possess a working knowledge of:
 - a. Knowledge and experience with the Delaware Field Guide, Delaware Standard Work Specifications, and the WAP Manual; and
 - b. Building science principles.

5.2.8.1 Project Management

Demonstrate the ability to:

1. Manage a crew of Installers so weatherization work is conducted safely, effectively, and efficiently;
2. Ensure that the job site and Installers comply with the Safe Work Practices described previously;
3. Maintain quality control of weatherization work and ensure it meets program standards;
4. Understand a work order;
5. Order and obtain materials, supplies, and equipment in time to avoid delays and wasted time on the job site; and Warehouse materials as necessary to avoid delays in completing weatherization work.
6. Warehouse materials as necessary to avoid delays in completing weatherization work.

5.2.8.2 Inspection and Measurement

Possess a working knowledge of:

1. Air and heat flow in buildings;
2. Factors that affect building heat loss;

3. Construction features and critical junction points of common housing types;
4. Insulation R-values
5. Different insulation materials and installation techniques;
6. Various air-sealing techniques and appropriate materials;
7. Causes of and remedies for existing and potential moisture problems;
8. Causes of and remedies for other existing and potential indoor air quality problems;
9. Residential mechanical ventilation systems;
10. Minimum ventilation rates/building tightness limits based on the appropriate ASHRAE 62 standard; and
11. Electric base-load usage.

Demonstrate the ability to:

1. Measure the dimensions of floors, walls, ceilings, windows, and doors, and compute surface areas;
2. Compute the volume of conditioned space of a building;
3. Define the thermal envelope of a building; and
4. Assess the effectiveness of existing insulation and the effective R-values.

5.2.8.3 Diagnostic Testing

Possess a working knowledge of:

1. Principles of air movement and how they relate to building heat loss;
2. Typical air leakage problems in common housing types; and
3. Minimum ventilation rates.

Demonstrate the ability to:

- Set up a blower door;
- Prepare a building for a blower door test; and
- Take blower door reading and interpret results.

5.2.8.3.1 Zone pressure diagnostics

Possess a working knowledge of:

1. The air barrier of a building and the importance of aligning it with the thermal barrier; and
2. Primary and intermediate zones of a house.

Demonstrate the ability to:

1. Conduct zone pressure diagnostics and interpret results; and
2. Determine the location and effectiveness of the air barrier of a house.

5.2.8.3.2 Duct testing

Possess a working knowledge of:

1. Problems associated with different types of duct leakage.

Demonstrate the ability to:

1. Determine the amount of duct leakage or least the existence of significant duct leakage by conducting pressure pan testing;

2. Measure room pressure imbalances in houses with forced-air systems; and
3. Resolve room pressure imbalances.

5.2.8.3.3 Combustion Appliance Safety

Possess a working knowledge of:

1. CO action levels;
2. Common code requirements related to:
 - Vent system sizing, materials, clearances, and installation;
 - Safety shut-off devices;
 - Gas line sizing; and
 - Combustion air.
3. Causes of and remedies to common vent system problems.

Demonstrate the ability to:

1. Measure the CO level in ambient air;
2. Measure the CO level of vented and unvented combustion appliances;
3. Measure the CO levels of gas- or propane-fired cook stoves (oven and burners) and remedy high CO levels through basic cleaning and adjustments;
4. Understand the difference between as-measured and air-free CO readings;
5. Detect gas, propane, and fuel oil leaks; and
6. Conduct a worst-case draft test of a combustion appliance zone; and
7. Measure the steady-state efficiency of a vented combustion appliance.

5.2.8.3.4 Insulation

1. In addition to the insulation-related installer competencies, possess a working knowledge of Local codes relating to attic ventilation.

5.2.8.3.5 Training

Possess a working knowledge of:

1. Adult learning concepts; and
2. Benefits of cross training on-site personnel.

Demonstrate the ability to:

1. Provide on-site training to installers in a positive environment to strengthen competency in existing skills and increase the number of skill areas.

5.2.8.3.6 Weatherization Installer Competencies

1. Possess Safe Work Practices competencies;
2. High school diploma or equivalent;
3. Valid driver's license; and
4. Must have reliable transportation for travel to and from work.

5.2.8.3.7 Air Sealing

Possess a working knowledge of:

1. Proper materials selection based on location of leakage areas; and
2. Minimum ventilation rates.

Demonstrate the ability to:

1. Use the blower door to locate leakage sites within the building;
2. Seal attic and floor bypasses at penetrations for plumbing, electrical wiring, flue vents, ducts; dropped soffits, and balloon-framed walls;
3. Seal typical bypasses in knee walls and finished attic spaces;
4. Seal basement band joists;
5. Properly apply caulk and spray foam insulation;
6. Identify, select, and install weather stripping on doors, windows, and attic hatches;
7. Cut glass, replace broken window panes, and apply glazing compound;
8. Repair plaster and sheetrock (drywall); and
9. Modify or install mechanical ventilation to ensure acceptable indoor air quality for post-air-sealing conditions.

5.2.8.3.8 Duct Sealing

Demonstrate the ability to:

1. Properly seal duct connections with mastic and fiberglass mesh tape or other approved material; and
2. Repair or modify duct systems as specified in a work order.

5.2.8.3.9 Insulation

Possess a working knowledge of:

1. Properties and appropriate application of different insulation materials; and
2. Potential hazards of insulating around knob-and-tube wiring.

Demonstrate the ability to:

1. Install blown and batt attic insulation;
2. Access closed wall cavities and properly install dense-packed cellulose wall insulation including removing and replacing siding;
3. Install blown insulation and batt insulation in a floor;
4. Install water heater installation blankets;
5. Install insulation on ducts, hydronic distribution pipes, and domestic hot water pipes; and
6. Safely operate and properly maintain insulation blowing machines and generators.

5.2.8.3.10 Baseload Measures

Demonstrate the ability to:

1. Replace incandescent light bulbs with compact fluorescent lamps while maintaining or improving lighting levels; and
2. Install low-flow showerheads and faucet aerators;
3. Assess the existing condition of plumbing pipes and faucets that may prohibit

these measures.

5.2.8.4 HVAC Technician Competencies

5.2.8.4.1 Prerequisites

1. Possess Safe Work Practices and Weatherization Technician competencies;
2. Possess Delaware HVAC license, and
3. Complete required WAP HVAC courses

5.2.8.4.2 HVAC Installation and Repair

Possess a working knowledge of:

1. The essential components and operation of typical residential electrical, gas, oil and solid fuel appliances;
2. Weatherization Assistance Program Standards for maintenance, repair, and replacement of typical HVAC Systems;
3. National, State, and local codes that apply the safe and proper installation residential HVAC systems; and
4. All WAP required documentation, procedures, standards and policies related to HVAC systems.

Demonstrate the ability to:

1. Maintain quality control Weatherization work and ensure it meets WAP standards;
2. Inspect, test, diagnose and document all pre- and post-test results according to WAP standards;
3. Perform required maintenance, repairs, safety and efficiency measures, replacements and required documentation according to WAP standards and applicable codes;
4. Recognize and correct deficiencies with existing HVAC installations;
5. Calculate the heating and/or cooling load of a dwelling per *Manual J*, NEAT or MHEA to ensure proper sizing of replacement heating and cooling systems;
6. Ensure proper sizing of wiring, piping and venting of HVAC equipment;
7. Ensure code compliance of minimum safe clearances of HVAC equipment and venting systems;
8. Ensure code compliance regarding sufficient combustion air for combustion appliances;
9. Repair or replace vent systems of combustion appliances in a code compliant manner;
10. Repair or replace a water heater in a code complaint manner;
11. Assess duct system performance and make necessary repairs, adjustments and modifications for optimum efficiency;
12. Perform combustion safety (CAZ and worst case draft) testing to ensure proper vent system functioning;
13. Perform combustible gas leak detection testing;
14. Perform *Manual D* when new duct systems are necessary; and
15. Ensure that all necessary information and tests (pre and post) are accurately performed and documented and in the client file once the job is completed.

5.2.8.4.3 Termination of a QCI Inspector

In the event that a QCI is found to have inadequate inspection practices and/or lacks adherence to the SWS, Delaware Field Guide, and WAP policies and procedures, the Grantee will determine if the inadequacy is a training void or ethical concern. If the QCI requires additional training, the QCI will have a Corrective Action Plan (CAP) developed by the Grantee to address the training needs. If the QCI refuses training or does not adhere to the CAP, the QCI will be terminated from the Program.

If the Grantee identifies the inadequacy as an ethical issue that is substantiated and/or the training has not alleviated concerns of the QCI adequacy, the QCI will not be allowed to act in the capacity of a QCI in the Program. At the discretion of the Grantee, a probationary period can be established to monitor the progress of a QCI. This probationary period must be expressed to the QCI in writing and it must outline the details of compliance with the Program and the length of the period.

5.3 CERTIFICATION OF PROGRAM PERSONNEL - RESERVED

5.4 TRAINING

Proper training is the key to a successful and productive WAP. The WAP has implemented an aggressive training program that places specific training requirements on the Subgrantee and its subcontractors. Available and relevant training ensures that weatherization measures are applied efficiently, consistently and with a high standard of workmanship. T & TA activities will guarantee that the program maximizes energy savings, minimizes production costs, improves quality of work and reduces mismanagement.

5.4.1 Training Plan

The Grantee is required each year to provide a training plan as part of its State Plan application for DOE WAP funds. The current training plan for the PY can be found on the DNREC/DEC website under the State Plan.

In addition, the Subgrantee shall annually submit a training plan in accordance with the Grantee and DOE requirements on or before December 31 of each year. The Plan should outline the training objectives showing how the Subgrantee will fill voids in their staffing and their contractors. Approval of the plan constitutes approval of the training listed by the Subgrantee, unless otherwise stipulated. Additional training approval can be requested at any time during the year.

Training expenses will be allocated by the Grantee or Subgrantee T&TA budgeted funds. Additional funding sources for training may be used at the discretion of the Grantee. Grantee and Subgrantee personnel expenses may be categorized as T&TA costs when those personnel are actively engaged in Program training or technical assistance activities.

5.4.2 Subcontractor Retention

The Grantee and Subgrantees may secure a retention agreement in exchange for training provided by either or both entities. The agreement should stipulate that the trained personnel will continue to work in the WAP for a period of six months. It is the responsibility of the contractor to

judiciously determine who will receive training. Failure to maintain employment or participation in the Program may be cause for reimbursement or additional costs for future training as determined by the Grantee.

6. PROGRAM MONITORING AND QUALITY ASSURANCE

The Grantee is committed to a comprehensive program of quality assurance, in its own operations and those of the Subgrantee. Quality assurance can take many forms and will include, but not be limited to:

1. Continuous monitoring through on-site technical visits, ongoing claims reviews, and ongoing production report reviews
2. Annual Administrative Reviews (AAR), including a fiscal review of the local programs. Reviews will be done no less than annually.
3. State desk reviews of Subgrantee production and expenditure reports in comparison to state and Subgrantee production goals
4. State review of 100% of claims, comparing measures and amounts
5. State technical review of weatherization jobs as they are in-process in accordance with the State Plan
6. Grantee review of 10% of all completed cases, including case file eligibility reviews and technical reviews
7. State review of the Subgrantee's annual independent audit of weatherization funds
8. Subgrantee on-site, technical visit reviews of the subcontractor's work
9. Subgrantee review of invoices, case files, job quality, wage records and training records

6.1 Annual Administrative Review

The Grantee staff will conduct an annual, comprehensive, monitoring of the Subgrantee's Weatherization Program referred to as the Annual Administrative Review. The AAR will assess the Subgrantee's program including

- Program overview
- Administrative procedures and controls
- Weatherization measures
- Financial controls and reporting
- Client file reviews
- Training and technical assistance needs
- Health and safety

6.1.1 Subgrantee Monitoring Protocol and Checklist

The Grantee will utilize a checklist when conducting the AAR. A copy of the Subgrantee Monitoring Protocol and Checklist will be provided to the Subgrantee in advance of the yearly monitoring.

6.1.2 AAR Report

The report, addressed to the Executive Director of the agency and delivered 30 business days from the date of the last day of the review, will include the state's recommendations and

requirements for the Subgrantee and its subcontractors. The structure of the written report will follow the Subgrantee Monitoring Protocol and Checklist and provide a clear, specific and concise list of areas for the Subgrantee to address. All of the major areas reviewed will be listed with a statement of issue, followed by WAP recommendations or requirements. If no issue is found in a major section, that will also be stated. The report will highlight areas where the Subgrantee excels.

The Grantee will address each of the major areas of the report using one or more of three determinations:

1. GENERAL COMMENTS
 - RESPONSE: No Subgrantee response is required.
2. RECOMMENDATION
 - ISSUE: A matter was identified in this area which is not a matter of regulatory compliance but is based on the State Monitor's knowledge of sound Program practices. It includes suggestions for program procedures; suggestions for protocols in the weatherization work; or, other recommendations by the Grantee for the improvement of the local Program.
 - RESPONSE: Subgrantee action on Grantee recommendations is optional but a response to the item is required.
3. REQUIREMENT
 - ISSUE: A problem was identified which is a matter of compliance with the legal, regulatory or contractual obligations of the Subgrantee. A problem was identified which is a matter of acceptable weatherization workmanship. The report must cite a source for the requirements, which may include the Subgrantee's contract, the State Plan, federal or state laws, regulations or program policies.
 - RESPONSE: Subgrantees must implement a required corrective action in response. The response must be detailed and a time frame provided for compliance is required. Subsequent monitoring will ensure the requirement has been implemented.

6.1.3 Subgrantee Response to the AAR Report

The Subgrantee shall provide the appropriate response to the AAR Report within thirty (30) business days of the date of the report. A written response is required for every recommendation or requirement listed in the report. In many instances, corrective action may be taken immediately, or may have already been taken following the review. The response must detail all actions taken by the Subgrantee, even those already taken.

In some instances, the report may require a longer term action on the part of the Subgrantee. The Subgrantee's response should detail the specific steps to be implemented and give time frames necessary to address each issue. Where longer terms are required, particularly solutions that are going to take more than the required thirty-day response time, it is the responsibility of the Subgrantee to periodically report progress on the issue to the Grantee.

Responses to the Grantee regarding monitoring issues are important. Lack of response to outstanding issues may negatively affect future contracting between the Grantee and current Subgrantee.

State monitors will follow up on outstanding issues in subsequent monitoring's.

6.1.4 AAR Follow Up

The Grantee recognizes that continuous quality improvement can be achieved by close review of the monitoring results and their effect on the overall Program design and operation. Monitoring results will be used by state administrators to identify ways that the weatherization plan can be improved each year. This will be done in a formal annual meeting with state and local Program staff to review monitoring results and assess changes that may result in the Program from those results.

The AAR, along with the initial review and various follow up reviews, will largely determine whether the Grantee continues to contract with a particular Subgrantee in future Program Years.

6.2 Weatherization Case File Review

The Case File Review process may be conducted continuously throughout the year on a random sample of cases selected by the Grantee from among Subgrantee files or may be done as part of the AAR. The process will involve a review of case documents regarding claims, eligibility, and technical services.

Specific issues will be discussed with the Subgrantee's program staff and management as they are discovered. Significant issues, such as those affecting health and safety, should be documented and corrected immediately. Specific case errors, such as those affecting eligibility for services will also be addressed immediately, in writing. All documented issues will require a response from the Subgrantee with written details as to the corrective actions applied to the case.

Otherwise, the Grantee will maintain monitoring forms and observations from Case File Reviews in the Subgrantee's state files. Issues and trends noted over the course of case file monitoring will then be addressed in the annual monitoring report along with recommendations or requirements addressing them.

There are three aspects to the Grantee's review of each weatherization case. They include:

6.2.1 Eligibility Review

The Grantee's goal is to review 10% of individual case files for accuracy. The eligibility determination for the dwelling and client, forms and supporting documentation will be reviewed. The Subgrantee's adherence to the waiting list will be reviewed. Files will also be reviewed for completeness of appropriate forms including a record of client education. The Grantee will monitor a random sample of denied applications in order to determine that applicants were given their right to appeal the denial.

6.2.2 Technical Review

The Grantee review of the case files for documentation on weatherization measures conducted by the Subgrantee's contractors will include review of the Energy Auditor's documents for justification and prioritization of the recommended measures, including recorded test results and program standards. The measures itemized by the Subgrantee on the Work Order will be reviewed based on the auditor's recommendations, the program protocols and priorities, as well as the availability of funds.

The review will proceed to look at the Subgrantee's records of the measures that were implemented in the unit. The report from the Final Inspector will be used to assess that all work was completed as per the Work Order.

Based on the determination of the Grantee staff, a technical review of the case file may be complemented by an on-site visit by the Grantee technical staff to conduct an inspection of the work completed.

6.2.3 Claims Review

The Grantee will review 100% of the claims documentation for the units submitted by the Subgrantee as complete. This review will specifically compare (1) the measures called for on the Work Order and Change Orders with (2) measures billed on the subcontractor's invoices, and with (3) the measures that passed Final Inspection.

The monitor will also compare the invoiced charges with the program maximum prices or other amounts negotiated by the Subgrantee for the specific job. Claims reviews will be conducted by the Grantee as claims are submitted.

6.3 Subgrantee Monitoring of Contractors

There are numerous Subgrantee responsibilities detailed in this manual which will require the agency to set up a review program of its own to monitor the performance and compliance of its subcontractors. The Subgrantee is responsible for the performance of its staff and its subcontractors. Some areas which must be addressed include the following.

The Subgrantee must implement a process of careful review of all subcontractor bills and back-up documentation. The process must include a comparison of: (1) the measures ordered on the Work Order with (2) the measures paid by invoice with (3) the measures passed in the Final Inspection.

The Subgrantee must have an ongoing case review procedure whereby all case files and claims are reviewed by a supervisor for completeness and accuracy.

The Subgrantee must schedule an ongoing monitoring of the quality of the weatherization work. This monitoring should be conducted by a weatherization technician who routinely visits the worksites and observes technical work along with paperwork to ensure the job is being done right. Subcontractors should be issued written reports on significant issues in their work or workplace.

The Subgrantee must put in place any other procedures that are necessary to monitor the compliance by the Subgrantee's staff and its subcontractors to its agreement with the Grantee as well as the policies contained herein.

6.4 Grantee Monitoring of a Contracted Entity

A major goal of the Delaware Weatherization Assistance Program (WAP) is that clients receive services in a safe, effective and efficient manner. The intent is that contractors that provide weatherization assistance services are qualified, competent and demonstrate a high degree of professionalism. In ensuring that the WAP can meet the program goals, a policy has been established to discipline and/or suspend entities from performing weatherization services that are funded through the WAP. This policy shall apply to Subgrantee staff, contractors, or contractor employees providing weatherization services as part of the WAP. Under this policy the Subgrantee staff, contractors, or

contractor employees can be disciplined in the following manner: (1) denied participation until remedial training is obtained, as directed by WAP; (2) denied participation in the WAP for a period up to two (2) years; and/or (3) suspended or debarred indefinitely. The following violations by the Subgrantee staff, contractors, or contractor employees can lead to disciplinary action:

6.4.1 Violations:

1. Repeated occurrences of failed Health & Safety testing, including the Combustion Appliance Zone testing;
2. Repeated occurrences of failing to properly complete the required forms;
3. Repeated monitoring findings related to the contractor or persons performing the work;
4. Repeated incidents of unsatisfactory, substandard work performance;
5. Repeated incidents of Subgrantee having to repay funds related to poor work performance and errors by the contractor;
6. Repeated incidents of noncompliance with state and federal WAP policies, procedures, rules and regulations;
7. Fraudulent activity or fraudulent charges that are being reimbursed by the Weatherization Assistance Program; or
8. Negligent work performance that leaves clients in imminent danger directly related to WAP services.

6.4.2 Consequences:

Remedial Training - A contractor or persons performing work that fall under any of the categories (1-2) will be recommended for remedial training and will be denied participation until remedial training is completed.

Probationary Period - A contractor or persons performing work that fall under any of the categories (1-6) may be recommended for a probationary period determined by the Grantee and will be denied participation until completion of the probationary period.

Denial of Participation - A contractor or persons performing work that fall under any of the categories (3-6) can be denied participation for up to 2 years.

Permanent Debarment - A contractor or persons performing work that fall under category (7-8) will fall under the Delaware WAP Suspension & Debarment Policy, which could lead to permanent debarment from providing weatherization services funded through the Delaware Weatherization Assistance Program.

7. REPORTING REQUIREMENTS

The Grantee, Subgrantee and the weatherization subcontractors each have the responsibility to report information which accurately reflects their performance in the WAP. Much of the required data come from those elements which are submitted to the Department of Energy (DOE) by the Grantee. The Grantee requires accurate information from the Subgrantee to properly monitor and manage the Program's overall operation.

7.1 SUBGRANTEE REPORTING

The Subgrantee is required to submit periodic reports detailing the agency's implementation of the Weatherization program. Most reports are submitted to the Grantee detailing the agency's progress in weatherizing units, assisting clients, expending program funds and providing economic stimulus. The Subgrantee shall collect and provide production, demographic and financial statistical information from each person who applies for the Delaware WAP in accordance with all federal and state requirements and in a format and time frame determined by the Grantee.

7.1.1 Weekly Reports

The Subgrantee weekly production report is submitted to the Grantee with data for the number of units the agency has in progress and the units which have been completed. The report shall be in a form and relayed as determined by the Grantee and subject to change to meet reporting requirements. At a minimum, weekly reports shall include:

1. The total number of clients who were processed through the intake procedures during the previous week
2. The total number of units which have had a complete energy audit during the previous week
3. The total number of units that have installation or shell work conducted during the previous week.
4. The total number Final Inspections conducted in the reporting period.
5. The number of units deferred during the reporting period.

7.1.2 Periodic Comprehensive Reports

In addition to weekly reports as noted above, Subgrantees may be required to provide more comprehensive reports on a monthly, quarterly or annual basis noting certain characteristics of completed units.

7.1.3 Subgrantee Training Report

The Subgrantee is responsible for tracking the training of all personnel used in the WAP. This information includes both required and optional training. Training of the Subgrantee's own employees as well as those of its subcontractors must be tracked on an individual basis and made available to the Grantee upon request.

The utilization of appropriately trained employees is a requirement for payment for work under the program. The inability to document the training of individuals used in weatherization may result in a disallowed or questioned cost.

7.1.4 Subgrantee Expenditure Reports

The Subgrantee is required to track and report to the state on its expenditures each month. The report will be made on the form required by the Grantee by budget line item.

It is the responsibility of the Subgrantee to track its expenditures over the period of the contract so that funding allocations are not over-expended. It is the responsibility of the Subgrantee not to exceed line item limitations, including the average cost per unit, over the period of the contract.

7.2 STATE REPORTING

7.2.1 Grantee Quarterly Program Reports

The state submits a quarterly programmatic report to DOE that lists the statewide totals for all metrics reported by the Subgrantee on units and individuals, as detailed above.

In addition, as with all federal grants, the Grantee reports quarterly weatherization budget expenditures on Standard Form 269A, Financial Status Report, as prescribed by OMB Circulars A-102 and A-110.

7.2.2 Annual Training, Technical Assistance, Monitoring, and Leveraging

This report is made annually to DOE as a part of DNREC's State Plan. It describes the state's progress in the following three areas.

- Training and Technical Assistance Activities: lists and describes the training and technical assistance activities attended and conducted during the previous PY.
- Monitoring Activities: lists the Subgrantees which were monitored during the year. Describes significant findings and corrective actions.
- Leveraging Activities: lists and describes the projects executed and the amount and source of funding successfully leveraged during the report year.

8. PROCUREMENT

The Grantee and the Subgrantee are required to purchase all goods and services for use in the WAP in an open and free competition ensuring that the best product or service is received for the most reasonable cost.

Subgrantees shall have a written procurement policy for all goods and services purchased for the WAP program and said Procurement Policy shall be reviewed and approved by the Grantee prior to procurement of any good or service. In addition to following its own approved procurement process, Subgrantee shall abide by the following:

8.1 GENERAL PROVISIONS

8.1.1 Minority and Women Business Enterprises

Subgrantee is encouraged to solicit competitive responses from small businesses, minority-owned businesses and women-owned businesses. This requirement should not be interpreted to mean preferential treatment is given to such entities in the award process. However, efforts should be made to identify such businesses in the area and ensure that they are notified of the availability of opportunities to bid on purchases.

8.1.2 Procurement Documentation

All procurement transactions, from start to finish, must be fully documented. Records of individual procurement transactions shall be maintained by the Subgrantee in sufficient detail to record the history of the procurement. Documentation must be made available to the Grantee for administrative monitoring and be available for the agency audit.

Procurement records shall include, but are not limited to, the following:

1. The rationale for the method of procurement (small purchases, price quotes, bids, requests for proposal)
2. Evidence of procurement process (newspaper advertisements, responses, bidder meeting records, proposal documentation, evaluation forms, etc.)
3. Evaluation records, tabulation of bids
4. Basis for vendor/contractor selection or rejection
5. Basis for purchase/contract price
6. For those procurements where competitive bidding is not required, the price or quote sheets
7. Appropriate agency sign-offs
8. Appropriate reasons if the low bidder was not selected.

8.1.3 Evaluation

The method to evaluate a response depends of the procurement type, the complexity of the purchase and the dollar level of the purchase. The evaluation, like the procurement process should be designed to ensure the best product for the most reasonable cost. In some cases, the evaluation will simply be a determination of the lowest quoted cost. With more complex purchases, such as weatherization subcontracts, the Subgrantee will need to have an evaluation which not only scores the proposal based on price but that takes into account other qualitative factors such as the company's experience, resources, and staffing.

8.1.4 Protest Resolution

The Subgrantee should have a process in place for the resolution of protests from companies regarding the awarding of a purchase or service. Generally, this would include a review of the various responses by a higher level of authority within the agency followed by a formal letter to the protestor with the results of the review.

8.1.5 Debarment and Suspension

Prior to entering into the Delaware WAP, a subcontractor must certify that neither it nor its principals are presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from entering into this Agreement by any Federal or State department or agency for the past five years. This certification must be provided annually and prior to a new contract with a Subgrantee.

8.1.6 Advertisement

Advertising ensures a more competitive process and will result in a more reasonable cost. Ads should be placed in a newspaper with the widest area circulation and far enough in advance to ensure the respondents have time to reply appropriately. Ads may also be posted in other local media and on internet sites related to the proposed service or item to be purchased.

Some of the information essential for a good ad includes the following.

1. Subgrantee agency name, address, where response should be sent
2. Contact information to obtain additional information
3. Purpose of the solicitation with a brief description of the item or service
4. Directions on responding

5. Notice of any meetings or means for help
6. Deadlines for responses
7. Statement encouraging responses by small, minority-owned, women owned businesses
8. Statement of limitations on the response, i.e. response will or will not be accepted in certain formats (e.g. mail, email, fax)
9. Statement that late responses will not be accepted, if applicable

8.2 PROCUREMENT TYPES

There are several types of procurement procedures. Which to use depends on the amount of funds to be expended and the complexity of the item or service to be purchased. The Subgrantee is encouraged to include in its procurement policy the following general provisions:

8.2.1 Small Purchases

Small purchases utilize relatively direct and informal procurement methods for securing services, supplies, or other items that do not cost more than \$5,000 in the aggregate. Items should be purchased on a competitive basis but the formality of the purchase process may vary according to dollar levels used by the Subgrantee in its approved, written procurement policies.

The Subgrantee is encouraged to further segment procurement policies according to the level of expenditure. Purchases under \$100 in the aggregate can be made at the Subgrantee's discretion, observing Subgrantee internal controls governing purchase orders, receipts and payment of invoices.

For purchases from \$100 to \$1,000, the Subgrantee should have a process which produces the records to be maintained for audit purposes and tracked as inventory (as outlined in Section 4.4), including:

1. A detailed description of purchased item
2. Written justification explaining the need for the purchase
3. A record of a minimum of three telephone quotes or written cost quotes (may include catalog listings) for the item (quote matching the item description)
4. Written justification when not accepting lowest quoted cost
5. Approval of the purchase signed by the authorized administrative or financial Subgrantee agency official, and
6. Purchase record and receipt.

For purchases over \$1,000, but under \$5,000 the Subgrantee records available for review and audit should include:

1. A written description of the item with detailed specifications, as applicable
2. Written justification explaining the need for the purchase
3. A record of a minimum of three written cost quotes (may include catalog listings) for the item;
4. Written justification and supervisory approval when not accepting lowest quoted cost;
5. Approval of the purchase signed by the authorized administrative or financial Subgrantee agency official; and,
6. Purchase record and receipt.

8.2.2 Large Purchases

All purchases with a cost greater than \$5,000 should require a more formal process (tracked as inventory as outlined in Section 4.4). Such items for which cost is the sole factor, and no other comparative factors are involved, should be purchased through an Invitation to Bid (ITB) process.

The ITB process requires that the contract be awarded to the lowest responsive and responsible bidder. If any or all bids are rejected, sound documentation for such must be written and placed with other bid materials.

The bid packet should be documented along with the process and subsequent purchase records. The following should be available for review and audit:

1. Written, prior approval of the purchase from the Grantee;
2. Written justification explaining the need for the purchase;
3. The Subgrantee's approved ITB procedure used for the purchase (on file);
4. A written description of the item or service to be purchased, with detailed specifications, as applicable;
5. Date, time and location of the bid opening;
6. Methodology for bid lowest price bid selection;
7. A record of a minimum of three written requests for quotes for the purchase;
8. A record of a quotes received for the purchase;
9. Documented explanation of the reason for the rejection of any bidder;
10. Approval of the purchase signed by the authorized administrative or financial Subgrantee agency official;
11. Purchase record, receipt, etc.; and,
12. Contracts or other agreements which result from and govern the purchase, as applicable (on file).

Cost plus percentage of cost purchasing is not allowed, WAP expenditures cannot be made on this basis. Bids must be based on a firm fixed price.

All bids received by the Subgrantee must be kept sealed and secure by agency purchasing personnel until the specified date and time of the bid opening.

8.2.3 Requests for Proposal (RFP)

Purchases of items with a cost greater than \$5,000 for which price is not the sole determining factor should be let in a process usually referred to as a Request for Proposal. While cost is still a strongly determinant factor, the RFP can allow for several other factors on which to evaluate the proposal. This allows the Subgrantee more latitude in its criteria for choosing its purchases particularly its subcontractor(s).

Documentation of the process and subsequent purchase records available for review and audit should include:

1. Written, prior approval from the Grantee of the item or service to be purchased;
2. The Subgrantee's approved RFP procedure to be used for the purchase (on file);
3. A written description of the item or service to be purchased, with detailed specifications, as applicable
4. A record of a minimum of three written requests for proposals for the purchase;
5. A record of all proposals received for the purchase;
6. Approval of the purchase signed by the authorized administrative or financial Subgrantee agency official; and,

7. Purchase record, receipt, etc.
8. Contracts or other agreements which result from and govern the purchase, as applicable (on file).
- 9.

8.3 WEATHERIZATION SUBCONTRACTOR PROCUREMENT

The Subgrantee's implementation of weatherization services may be subcontracted to companies and individuals with the demonstrated capacity and expertise to perform the various weatherization measures called for in the Program. As a number of factors besides cost are used to select a subcontractor, an RFP process is appropriate for selecting weatherization subcontractors. The process must call for proposals that demonstrate the company's experience, qualifications, and resources; as well as cost quotes that reflect a company capable and willing to provide effective workmanship.

As an important part of the continual improvement of the WAP, the company must be willing to undergo weatherization training as prescribed. In addition, subcontractors should develop a comprehensive approach to providing the array of weatherization measures in a whole-house approach.

The Grantee may, at the request of the Subgrantee, carry out an RFP process on behalf of the Subgrantee(s). If the Subgrantee conducts the RFP process, the Grantee shall review and approve the Subgrantee's policies and procedures for choosing its weatherization subcontractors and the RFP used to solicit bids.

The Subgrantee shall only use properly licensed private subcontractors who have attended required training and have attained the required certifications to provide and install weatherization measures. The Subgrantee shall ensure that all subcontracted work has all necessary and proper permits and is completed in conformance to applicable codes.

The Subgrantee shall ensure that subcontractors conduct all weatherization services using standard work practices approved by the WAP. The Subgrantee shall ensure that subcontractors conduct all weatherization services using equipment, materials and techniques approved by the Subgrantee and Grantee to ensure the consistency and quality of weatherization services. The Subgrantee will ensure that the contractor has received the materials necessary to understand and conform to compliance in the Program based on this Manual and the Delaware Standard Work Specifications. Receipt of the materials must be acknowledged by each contractor by signing a form confirming the receipt of the materials.

The Subgrantee shall ensure that subcontractors participate in technical training conducted by the Subgrantee or by the Grantee to ensure the consistency and quality of weatherization services prior to conducting any weatherization services.

8.3.1 Subcontractor Pools

The WAP classifies subcontractors into three subcontractor pools.

- Energy Auditor/Final Inspector Pool
- Building Shell Weatherization Pool
- Weatherization Mechanical Services Pool

Any Request for Proposals must be addressed specifically to companies within each of these categories of weatherization services.

8.3.2 Subcontractor Selection Criteria

The selection of weatherization subcontractors will take into consideration many factors, such as the bidding company's:

1. Bid price(s) for labor and materials in specific areas of weatherization;
2. Knowledge and experience in providing weatherization measures;
3. The extent to which the contractor agrees to provide whole house building shell work or provide comprehensive mechanical systems work;
4. Organizational, financial and personnel resources to be devoted to weatherization;
5. Specific WAP training background (and willingness to continue in training);
6. Licensing and certification applicable to weatherization work;
7. Willingness to comply with the federal, state and local WAP rules;
8. Willingness to comply with work standards and protocols set by the program; and,
9. Willingness to comply with applicable state and local construction codes.
10. Proof that the company and principles have not been debarred from work with the state or federal entities.
11. Previous performance in the program, if any.

8.3.3 Mechanical System Replacement bids

The Subgrantee shall utilize a competitive procurement process when replacement of a major mechanical equipment, such as furnaces is required. The Subgrantee shall request quotes from three local vendors who satisfy the Subgrantee's established procurement process for each major appliance to be purchased and maintain records documenting its requests (e.g., faxed or emailed furnace specifications to three pre-qualified local vendors with a written request for quote or bid). The unit case file should contain a record of the resulting quote from each qualified, licensed professional or a note that no bid was received. The Subgrantee shall cease requesting quotes from local vendors who fail to respond to quote requests.

8.3.4 Bidder Assurances

The company submitting bids to provide weatherization services must agree to comply with the following assurances which are fundamental to the Program. These assurances shall also become a part of any contract between the Subgrantee and the weatherization subcontractor.

1. Bidder acknowledges and agrees that the Price List used by the Delaware WAP contains the maximum amount the Grantee will authorize for payment for any weatherization measure conducted in a home.
2. Bidder assures that weatherization services will be conducted using equipment and materials as approved by the Subgrantee and the Grantee.
3. Bidder assures that all weatherization measures will be conducted using the SWS and Field Guide as approved by the Grantee.
4. Bidder assures that its weatherization employees will participate in technical training, appropriate to the work it is providing, as required by the Subgrantee and the Grantee.
5. Bidder agrees to maintain all required certifications and licenses required by the state, the locality, the Subgrantee or Grantee.
6. Bidder assures that it will comply with weatherization measures in the work order, including all drawings, plans and specifications determined by the Subgrantee based on the Energy Audit and the work priorities set forth in the state weatherization policies.

7. Bidder assures that all weatherization work will be properly permitted and completed in conformance to applicable building and other codes.
8. Bidder assures that the company will conform to local zoning codes.
9. Bidder assures that it will cooperate in Subgrantee compliance with Historic Preservation requirements.
10. Bidder agrees to provide proof of insurance and bonding in types and amounts required by the Subgrantee and Grantee.
11. Bidder agrees to maintain Workman's Compensation and Unemployment Compensation insurance as required by law.
12. Bidder agrees to furnish the Subgrantee with evidence of adequate liability insurance coverage in the form of a Certificate of Insurance that co-insures Subgrantee under this policy at the level of insurance required by the contract.
13. Bidder assures that no claims for reimbursement will be submitted for work outside of the measures set forth by the Subgrantee's Work Order, without prior, written modification of the order.
14. Bidder assures that no claims for reimbursement will be submitted for reimbursement of any costs incurred for any work performed, until such time as Subgrantee has performed an inspection and has determined in writing that any such work has been performed in a satisfactory manner.
15. Bidder assures that all funds received for weatherization will be documented and accounted for and using generally accepted accounting methods.
16. Bidder assures that the company will make available all records of weatherization work including testing results as required by the Subgrantee and Grantee.
17. Bidder assures that no gifts, money, other financial remuneration, or gratuities from persons in the company have been provided to the Subgrantee, the Subgrantee's employees, officers, or other persons associated with the Subgrantee.
18. Bidder assures that the company does not discriminate against any applicants, personnel, clients on the basis of race, color, creed, religion, sex, age, national origin, sexual orientation disability or status as a Vietnam era veteran. This is in compliance with Title VII of the Employment Act, Americans with Disabilities Act, and the Veterans.
19. Bidder assures that it is not debarred or suspended from doing business under any federal or State of Delaware grants.
20. Bidder agrees to provide criminal background checks, as may be required.
21. Bidder agrees to provide a drug free workplace, as required.

8.4 BIDDER WORKMANSHIP

The contract between the Subgrantee and contractor will require that all work meet the workmanship standards of the WAP. Standards of workmanship will be at the core of the training and technical assistance that will be a part of the subcontractor's relationship with the WAP.

All weatherization work completed by the subcontractor must meet descriptions and specifications identical to those quoted in the approved proposal.

8.4.1 Subcontractor Rework

The subcontractor will be responsible for all damages resulting from improper installation of weatherization materials and/or mechanical systems. The contractor is responsible to account for all corrective measures necessary to bring the unit(s) into compliance.

Subcontractor will be required to conduct additional work at its own expense on a job that has been reported as “complete” but does not pass the Final Inspection due to inadequate work practices or the use of substandard materials by the subcontractor. An additional Final Inspection of a unit required from a rework may be charged to the subcontractor by the State or the Subgrantee as a Re-inspection Fee as detailed in the Delaware WAP Price List.

An inordinate number of subcontractor reworks due to poor workmanship or material standards may result in a lesser volume of job assignments or other action including possible termination of the subcontract.

9. APPENDIX A

Appendix A List of Acronyms

ACM	Asbestos-Containing Material
ACH	Air Changes per Hour
AGA	American Gas Association
AHERA	Asbestos Hazard Emergency Response Act
AAR	Annual Administrative Review
BPI	Building Performance Institute
BTU	British Thermal Unit
CFM	Cubic Feet Per Minute
CFM ₅₀	Cubic Feet Per Minute at 50 Pascals
CAP	Community Action Program
CFR	Code of Federal Regulations
CO	Carbon Monoxide
CO ₂	Carbon Dioxide
CAZ	Combustion Appliance Zone
CFL	Compact Florescent Light
CPSF	Certified Professional Service Firm
CT&E	Clean, Tune & Evaluate
DNREC	Department of Natural Resource and Environmental Control
DOE	Department of Energy
DEC	Division of Energy & Climate
DHSS	Department of Health & Social Services
DEAP	Delaware Energy Assistance Program
EPA	Environmental Protection Agency
ECM	Energy Conservation Measure
GFCI	Ground Fault Circuit Interrupter
H&S	Health & Safety
HSM	Health and Safety Measure
HEPA	High Efficiency Particulate Air
HIPAA	Health Insurance Portability and Accountability Act
HVAC	Heating, Ventilation & Air Conditioning
IC	insulated contact
ICAT	Insulation Contact Air Tight
IECC	International Energy Conservation Code
IWC	Inches of Water Column
ITB	Invitation to Bid
IRM	Incidental Repair Measure
Lf	Linear Feet
LIHEAP	Low Income Energy Assistance Program
MHEA	Manufactured Home Energy Audit
MSHA	Mine Safety and Health Administration
NFPA	National Fire Protection Association
NEAT	National Energy Audit
NID	Negotiated Instrument Definition
NHPA	National Historic Preservation Act of 1966
NIOSH	National Institute of Occupational Safety and Health

O2	Oxygen
OMB	Office of Management & Budget
OSB	Oriented Strand Board
OSHA	Occupational Safety & Health Administration
Pa	Pascal
PU	Program Update
PPE	Personal Protection Equipment
PPM	Parts Per Million
PVC	Polyvinyl chloride
PY	Program Year
QCI	Quality Control Inspector
RGGI	Regional Greenhouse Gas Initiative
RFP	Request for Proposal
RRP	Renovation, Repair, and Painting
SDS	Safety Data Sheets
SF	Square Feet
SWS	Standard Work Specification
SIR	Savings to Investment Ratio
SHPO	State Historical Preservation Office
T&TA	Training & Technical Assistance
VOC	Volatile Organic Compound
WAP	Weatherization Assistance Program
WPN	Weatherization Program Notice

10. APPENDIX B

Delaware Weatherization Assistance Program Health and Safety Plan

1. Introduction

While weatherization measures effectively reduce energy usage and costs, the nature and effect of the work require that care be taken to avoid unintended consequences. For example, air sealing may tighten a house to the point that indoor air pollutants become a greater problem. Or, faulty combustion appliances may spill deadly carbon monoxide that previously was diluted in the exchange of air through leaks in the envelope, but once the home is tightened, become a serious health concern.

Weatherization work, like any repair work on a house, is likely to alter existing conditions in a home. If a window requiring caulk happens to be coated with lead based paint, care must be taken not to create the serious health issues resulting from spreading dust particles on the floor where a baby may be crawling the next day. If a worker is replacing ducts around pipes that are wrapped with asbestos, serious lung problems could result from the disturbance of the asbestos particles.

Health and safety issues (also referred to as “H&S” herein) are critical for all concerned parties in the WAP. The clients we serve are our first priority, as they are and will be living in the homes we weatherize through our efforts, and their exposure levels are therefore potentially the highest in most health and safety problems. Our WAP Contractors, Subgrantees and state staff are also potentially exposed to health and safety risks, expanding the need for adequate health and safety planning and response protocols for a myriad of potential health and safety issues.

In cases where work activities would constitute a health and safety hazard, precautions should be taken. Partial Weatherization should also be considered where it might be advisable or necessary to limit or avoid particular measure(s) that may exacerbate a health or safety problem. In some cases, weatherization may have to be deferred while hazards are remedied. The response to any one health and safety issue is dependent on the issue, as is the need for testing, client education and training specific to the concern at hand. This plan outlines the issues, allowable actions, training and other aspects of many health and safety concerns. The list of concerns is taken from the US Department of Energy Weatherization Program Notice 11-6, published in 2011 and has been modified for use here in Delaware.

Training is a critical component of health and safety, and training needs are identified in this plan as well as in the annual plan and master plan in our Federal WAP Base grant application.

2. Responsibilities and Funding

Although the Weatherization Assistance Program is not capable of providing solutions for all health and safety issues, identification of potential hazards is essential to providing safe services. Therefore, each dwelling must be individually assessed by the qualified Home Energy Auditor to determine the existence of potential hazards to workers and clients. Contractors working in a home may also identify health and safety measures, as might inspectors or other staff. The Subgrantee has the ultimate responsibility to see that health & safety of the workers and the occupants is paramount throughout the implementation of weatherization services.

The Subgrantee has the responsibility to determine when weatherization work is to be deferred because of health and safety issues, as well as when the deferral is to be lifted. If there is a question on these decisions, the Subgrantee may consult with DNREC. DNREC's deferral policy and form are found in Section 5 of this plan.

Delaware budgets health and safety costs as a separate category, thereby excluding these costs from the average cost per unit calculation. Creating a separate budget category also allows these costs to be isolated from energy efficiency costs during program evaluations. Delaware limits health and safety expenses to 14.9% of its DOE Program Operations budget category.

Under some circumstances, correcting certain hazards may be paid for with weatherization funds to the extent that they qualify as "Incidental Repairs" which are necessary for the success of a weatherization measure or group of measures. Incidental repairs are those repairs necessary for the effective performance or preservation of weatherization materials and which are not expressly considered health and safety costs under Section 4 of this plan. Incidental repairs must be included in the SIR for the package of measures and in the average per unit limitation. Incidental repairs are controlled by the energy audit because the package of measures when including the incidental repair costs must achieve an SIR of one or greater to be installed; however, the total incidental repair cost shall be no more than \$400 in any one unit.

With the advent of ASHRAE 62.2, H&S costs have risen to approximately 14.9% per unit average expenditure for calendar year 2014 and beyond. Additional cost details and experience with 62.2 will refine that estimate in future years, however at the present time, we believe 14.9% to be a reasonable planning percentage for H&S expenses.

The Subgrantee is ultimately responsible for assuring that the total health and safety expenditures do not exceed the average for all units. The 14.9% average limitation is deemed reasonable to address any health and safety issues in accordance with Section 4 of this plan and should allow adherence to the 14.9% funding allocation limit noted above.

3. Assessment

Identification of health and safety concerns begins at the time of application through assessing occupant preexisting conditions and continues with a conversation with the client where the auditor should solicit concerns directly from the occupant and confirm what was previously reported, followed up with a detailed visual inspection in several key areas of the unit.

The Delaware WAP uses a form for the intake worker and auditor to use in order to assess health and safety concerns of the homeowner and in the home. The form is attached hereto and is expressly made a part of this Plan.

4. Health and Safety Issues Guidance

The following Health and Safety Guidance Table has been developed from the US DOE Weatherization Program Notice 11-6, which provides guidance to state grantees for developing their state-specific health and safety plans. It has been modified to include the required and restricted WPN 11-6 components and incorporate Delaware's state-specific actions and concerns. While not every possible health and safety issue is addressed herein, the guidance should provide enough relevant examples and direction to provide clarity to the many issues surrounding health and safety concerns. DOE funds can and will be spent in accordance with the following table.

Under any circumstance, the following themes and requirements shall be adhered to:

- Where removal or replacement is addressed for an allowed health and safety measure in the document, proper disposal is required, and allowed as a health and safety cost.
- Where hazards are identified, clients must be informed in writing, the document must be signed by the client, and a copy maintained in the client file.
- While working in homes, contractors will take all possible precautions to not aggravate existing client health and safety concerns. This may be as simple as making sure the client is not present during or after certain measures, or require client relocation while any hazardous situation is present. Deferral should be considered if the condition is such that harming the client cannot be avoided
- State and local (or jurisdiction having authority) codes must be followed while installing health and safety measures.
- Workers must be qualified and adequately trained according to state and local (or jurisdiction having authority) codes specific to the work being conducted (electrical, plumbing, etc.).

With respect to repair and/or replacement of heating units as detailed in the charts below, repair or replacement is an allowable cost under the Delaware program due to the climactic conditions present in this state. Failure to adequately heat a home in our area, which experiences an average of 4014 heating degree days each winter (source; US DOE: <http://apps1.eere.energy.gov/states/residential.cfm/state=DE#avgheat>), may result in illness or death, and as such repair or replacement under certain conditions is an allowable expense.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Air Conditioning and Heating Systems	<p>"Red tagged", inoperable, or nonexistent primary heating system replacement, repair, or installation is allowed with health and safety funds, unless the unit is eligible to be installed as an energy conservation measure or prevented by other guidance herein. "System" can mean a central unit or several individually operating units; however, when a central unit is in place, it shall be considered the primary unit, and all other units are to be considered secondary. Replacement or installation of secondary units is not allowed. Unsafe primary or secondary units must be repaired or removed, or deferral is required.</p> <p>Air conditioning system replacement, repair, or installation is not allowed with health and safety funds.</p>	<p>Repair, including clean and tune of primary heating units, is recommended when the level of combustion byproducts are above unit specifications; when dirt or other debris indicate likely inefficient operation. Replacement of heating units is permitted when:</p> <ul style="list-style-type: none"> the unit has a cracked heat exchanger, the unit is more expensive to fix than would cost to replace it It cannot be fixed due to age or parts 	<p>Make sure systems are present, operable, and performing. Perform an energy audit to determine if work should be performed as an energy conservation measure. Also perform a visual inspection of the primary heating unit; efficiency and combustion analysis to determine operating conditions and appropriate action.</p>	<p>Deferral is required in instances where a conversion of the fuel source to another is warranted or requested by the client, unless specifically approved on a case by case basis by the State WAP Administrator and DOE. Referral to other agencies or programs is required in instances where no other weatherization measures are needed or where a client is otherwise not eligible for the program, or where the home is deferred for other reasons not related to HVAC.</p>	<p>Discuss and provide information on appropriate use and maintenance of units and proper disposal of bulk fuel tanks when not removed.</p>	<p>Awareness of guidance. Licensing/certification for HVAC installers as required by jurisdiction having authority.</p>

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Appliances and Water Heaters	Replacement of water heaters is allowed on a case-by-case basis, but must be approved by the Subgrantees via approval of the work order. Replacement and installation of other appliances are not allowable health and safety costs. Repair and cleaning are allowed. Also see Air Conditioning and Heating Systems and Combustion Gases.	Replacement as a health and safety measure is warranted when the unit is leaking internally, costs more to repair than to replace, is not functioning or where internal combustion or electrical hazards exist that cannot be corrected through repair.	Determine whether appliances/water heaters are performing safely. Perform energy audit to determine if work is performed as an energy conservation measure. Combustion safety testing is required when combustion appliances are present. Inspect venting, gas lines, electrical, and water lines.	Deferral may be needed in instances where replacement is complex or costs more than 150% of the average cost of DHW heaters.	Discuss and provide information on appropriate use, maintenance, and disposal of appliances/water heaters.	Awareness of guidance. Conducting diagnostic training.
Asbestos - in siding, walls, ceilings, etc.	<p>Sampling for asbestos is an allowable cost, but shall not exceed \$300 per unit taken together. Removal and re-installation is an allowable expense under the Delaware WAP program, but is subject to bidding procedures as outlined.</p> <p>Prior to conducting any asbestos work, the Subgrantee shall solicit and receive no less than two written bids from licensed asbestos contractors for the work recommended by the auditor. The Subgrantee shall then choose the lowest bidder. In cases where projected costs exceed \$1500, the Subgrantee shall furnish all written bids to DNREC and seek written approval from DNREC to proceed.</p>	<p>Removal of siding (mitigation) is not allowed. Removal and replacement of a small amount of siding to perform side-wall dense pack insulation, is allowed by a certified professional.</p> <p>All precautions must be taken not to damage siding. Asbestos siding should never be cut or drilled. If removal and re-installation is not conducted by a CPSF, the contractor may insulate through the home's interior, or bypass wall insulation as an energy conservation measure altogether.</p>	Only a certified professional service (inspector /auditor) may collect samples to prove that a material is not asbestos.	If the condition of any asbestos in or on the home is deteriorated enough to pose an immediate safety problem to the client or weatherization workers, the Auditor can defer services until the problem is addressed by a trained professional.	The Auditor shall inspect the exterior wall surface and subsurface for asbestos siding during the original audit. If present, the auditor should inform the client that suspected asbestos siding is present and to not disturb it in any way.	<p>Workers should be trained in identifying asbestos containing materials.</p> <p>Any and all work on asbestos must be conducted by individuals or firms licensed or otherwise approved for such activities by the State of Delaware. Licensing information for the State may be obtained at:</p> <p>http://dfm.delaware.gov/envsrv/asbestos/</p>

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Asbestos - in vermiculite	<p>Encapsulation by an appropriately trained asbestos control professional is allowed. Removal is not allowed. Sampling for asbestos is an allowable cost, but shall not exceed \$300 per unit taken together.</p> <p>Prior to conducting any asbestos work, the Subgrantee shall solicit and receive no less than two written bids from licensed asbestos contractors for the work recommended by the auditor. The Subgrantee shall then choose the lowest bidder. In cases where projected costs exceed \$1500, the Subgrantee shall furnish all written bids to DNREC and seek written approval from DNREC to proceed.</p>	<p>When vermiculite is present, take precautionary measures as if it contains asbestos. Do not do a blower door test in the home.</p> <p>Contractors should be careful to utilize personal protection equipment (PPE) while in attics or areas suspected to contain asbestos.</p>	Only a Certified Professional Service Firm (CPSF) (inspector /auditor) may collect samples to prove that a material does not contain asbestos.	If the condition of any asbestos in/on the home is deteriorated enough to pose an immediate safety problem to the client or weatherization workers, the Auditor can defer services until the problem is addressed by a trained professional.	The auditor shall assess whether vermiculite is present. The auditor, if asbestos is present or suspected; the auditor should instruct the client not to disturb the suspected asbestos containing material.	<p>Workers should be trained in identifying asbestos containing materials. Any and all work on asbestos must be conducted by individuals or firms licensed or otherwise approved for such activities by the State of Delaware. Licensing information for the State may be obtained at:</p> <p>http://dfm.delaware.gov/envsrv/asbestos/.</p>

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Asbestos - on pipes, furnaces, and small covered surfaces	<p>Encapsulation is allowed, and must be conducted by an AHERA asbestos control professional. Any encapsulation work should be conducted prior to blower door testing. Removal may be allowed, and must be conducted by a licensed asbestos control professional, subject to the conditions of this section.</p> <p>Prior to conducting any asbestos work, the Subgrantee shall solicit and receive no less than two written bids from licensed asbestos contractors for the work recommended by the auditor. The Subgrantee shall then choose the lowest bidder. In cases where projected costs exceed \$1500, the Subgrantee shall furnish all written bids to DNREC and seek written approval from DNREC to proceed.</p>	Asbestos should not be disturbed by any WAP worker under any circumstance. If any worker suspects asbestos is or may become "friable", they should utilize asbestos appropriate PPE when working in proximity of the suspected ACM.	AHERA testing is allowed under the WAP and must be conducted by a CPSF.	If the condition of any asbestos in or on the home is deteriorated enough to pose an immediate safety problem to the client or weatherization workers, the Auditor can defer services until the problem is addressed by a trained professional.	The auditor should assume asbestos is present in covering materials and clients should be instructed not to disturb suspected asbestos containing material.	<p>Any and all work on asbestos must be conducted by individuals or firms licensed or otherwise approved for such activities by the State of Delaware. Licensing information for the State may be obtained at:</p> <p>http://dfm.delaware.gov/envsrv/asbestos/.</p>
Building Structure and Roofing	Building rehabilitation is beyond the scope of the Weatherization Assistance Program. Homes with conditions that require more than incidental repair should be deferred. See Mold and Moisture guidance below.	N/A	Visual inspection. Ensure that access to areas necessary for weatherization is safe for entry and performance of assessment, work, and inspection.	If needed repairs cannot be associated with protection of weatherization measures, the home must be deferred and the owner referred to other agencies and programs to address the situation	Notify client of structurally compromised areas.	How to identify structural and roofing issues.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Code Compliance	Correction of preexisting code compliance issues is not an allowable cost other than where weatherization measures are being conducted. State and local (or jurisdiction having authority) codes must be followed while installing weatherization measures.	Most code compliance is charged with the energy conservation measure associated with it; however, some code compliance is necessary to perform weatherization for the health and safety of the client and is not for the effective performance or preservation of the material (incidental repair), and should be charged to the health and safety budget	Visual inspection. Local code enforcement inspections.	Condemned properties and properties where “red tagged” health and safety conditions exist that cannot be corrected under this guidance should be deferred and the homeowner referred to other source of assistance.	Inform client of observed code compliance issues.	How to determine what code compliance may be required.
Combustion Gases	Proper venting to the outside for combustion appliances, including gas dryers, is required. Correction of venting is allowed when testing indicates a problem. (see also appliance and ventilation sections)	Venting is to be done in accordance with the DE Field Guide and shall be a H&S expenditure as noted in the DE price list. Extra costs for aesthetic purposes shall be the responsibility of the homeowner. When gases exceed action levels as outlined in the Field Guide, Subgrantee must be notified immediately and corrective action taken, which may include after-hours service calls or relocation of the resident for a period not exceeding 3 nights.	Testing is required when combustion appliances are present. Inspect venting of appliances and confirm adequate clearances. Test naturally drafting appliances for draft and spillage under worst case conditions before and after work that could have affected worst case conditions. Inspect cooking burners for operability and flame quality.	Deferral is required when combustion gases cannot be properly vented, or when the homeowner refuses to allow venting or to assume the cost of any aesthetic improvements to hide/address the new vent.	Provide client with combustion safety and hazards information, including the importance of using exhaust ventilation when cooking and the importance of keeping burners clean to limit the production of CO.	How to perform appropriate testing; determine when a building is excessively depressurized, and the difference between air free and as-measured.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Drainage - gutters, down spouts, extensions, flashing, sump pumps, landscape, etc.	The repair of existing drainage devices or minor landscaping designed to direct moisture away from the home is an allowable expense providing repairs do not exceed \$300. Major drainage issues, including landscaping, are beyond the scope of the Weatherization Assistance Program. See Mold and Moisture guidance below.	Repairs will ordinarily involve replacement of gutters and downspouts, sump pumps, flashing, etc. where repair will likely resolve a moisture problem.	Visual inspection.	Homes with conditions that may create a serious health concern that require more funds than can be applied through incidental repairs and H&S expenditures outlined here should be deferred.	Importance of cleaning and maintaining drainage systems. Information on proper landscape design.	How to recognize drainage issues.
Electrical, other than Knob-and-Tube Wiring	Minor electrical repairs are allowed where health or safety of the occupant is at risk. Upgrades and repairs are allowed when necessary to perform specific weatherization measures.	Repairs will ordinarily involve repair of existing wiring and circuits, but may include new circuits and wiring necessary to install ventilation in compliance with ASHRAE 62.2	Visual inspection. Voltage drop and voltage detection testing are allowed.	Deferral is required where expected costs for electrical repairs are in excess of \$500. Referral to other service programs should be made as needed.	Provide information on overloading circuits, electrical safety/risks.	How to identify electrical hazards. Local code compliance.
Electrical, Knob-and-Tube Wiring	Minor upgrades and repairs necessary for weatherization measures and where the health or safety of the occupant is at risk are allowed. Must provide sufficient damming or other means of isolating the knob-and-tube wiring prior to insulation.	Minor repair includes those repairs that can be done for \$300 or less. The cumulative electrical repair costs for knob and tube and other electrical repairs in any one unit cannot exceed \$800	Inspect for presence and condition of knob-and-tube wiring. Check for alterations that may create an electrical hazard. Voltage drop and voltage detection testing are allowed.	Deferral is recommended where the knob and tube wiring cannot be repaired or replaced for less than \$300	Provide information to client on over-current protection, overloading circuits, basic electrical safety/risks.	How to identify electrical hazards. Local code compliance.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Fire Hazards	Correction of fire hazards is allowed when necessary to safely perform weatherization.	Contractors must comply with NFPA standards and the DE Field Guide, along with applicable codes to prevent hazardous situations where combustible materials are located dangerously close to combustion appliances.	Check for fire hazards in the home during the audit and while performing weatherization.	Deferral is recommended where fire hazards cannot be mitigated or where compliance with NFPA or other codes will exceed \$500 in costs.	Inform client of observed hazards.	How to identify fire hazards.
Formaldehyde, Volatile Organic Compounds (VOCs), and other Air Pollutants	Removal of pollutants is allowed and is required if they pose a risk to workers or home inhabitants.	Removal must be in accordance with federal, state and local codes and cannot exceed \$100	Sensory inspection.	If pollutants pose a risk to workers and removal cannot be performed, or is not allowed by the client, the unit must be deferred.	Inform client of observed condition and associated risks. Provide client written materials on safety and proper disposal of household pollutants.	How to recognize potential hazards and when removal is necessary.
Injury Prevention of Occupants and Weatherization Workers - Measures such as repairing stairs and replacing handrails.	Minor repairs and installation may be conducted only when necessary to effectively weatherize the home; otherwise these measures are not allowed.	Minor repairs are those that can be performed for under \$300, and must be directly related to the need to safely perform weatherization activity.	Observe if dangers are present that would prevent weatherization.	Repairs costing more than \$300 are cause for a unit's deferral if weatherization cannot be safely performed without the repair. Referral to other service programs is recommended.	Inform client of observed hazards and associated risks.	Workers must take all reasonable precautions against performing work on homes that will subject workers or occupants to health and safety risks.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Lead Based Paint	Lead safe weatherization practices are allowable H&S expenses where costs are incurred during the emplacement of weatherization measures.	Follow EPA's Lead; Renovation, Repair and Painting Program (RRP) and Lead Safe Weatherization (LSW), which requires containment regardless of the square footage of disturbed area (level 1 containment for small areas below RRP de minimum levels).	Testing is allowed. Job site set up and cleaning verification is required by a Certified Renovator. Documentation (signed acknowledgment, photos, etc.) is required to be verified by Subgrantee and placed in client file. Assessments will be conducted during routine monitoring in the field to ensure all workers are properly trained and performing work under EPA and DOE standards.	Deferral is required when the extent and condition of lead-based paint in the house would potentially create further health and safety hazards.	Follow RRP requirements.	All weatherization crews working in pre-1978 housing must be trained in Lead Safe Weatherization (LSW) and be accompanied by an EPA Certified Renovator. Grantee Monitors/Inspectors must be Certified Renovators and receive LSW training.
Mold and Moisture	Limited water damage repairs and correction of moisture and mold creating conditions are allowed as H&S measures when necessary in order to weatherize the home and to ensure the long term stability and durability of the measures. Moisture prevention measures, such as vapor barriers, are allowable and paid in accordance to the DE WAP Price list. Mold testing and mold remediation are not allowable costs.	Moisture repair problems requiring less than \$500 in repair costs per unit are permissible.	Visual assessment is required and diagnostics such as moisture meters are recommended pre and prior to final inspection. Significant moisture issues are defined as any mold and water stains in excess of one square foot. Minor moisture problems are defined as having less than one square foot of visible mold or water stains.	If moisture issues are significant, the moisture condition must be corrected or the unit deferred. Many moisture conditions may not be severe but an attempt should still be made to correct them. For minor mold or moisture problems, weatherization can continue as long as proper ventilation is installed:	Provide client notification and disclaimer on mold and moisture awareness.	National curriculum on mold and moisture or equivalent.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Occupant Preexisting and Potential Health Conditions	Temporary relocation of at-risk occupants may be allowed as a H&S measure if a person's health may be at risk and/or the work activities could constitute a health or safety hazard.	Relocation is permissible when no other viable option exists and where relocation lasts no longer than 5 days and costs less than \$500, and when relocation will afford ample time to resolve the H&S problem.	Require occupant to reveal known or suspected health concerns as part of initial application for weatherization. Screen occupants again during audit.	An inability to meet the standards provided herein must result in deferral. Referral to the state Division of Public Health or other health professional is recommended.	Provide client information of any known risks. Provide worker contact information so client can inform of any issues.	How to assess occupant preexisting conditions and determining what action to take if the home is not deferred. Awareness of potential hazards.
Occupational Safety and Health Administration (OSHA) and Crew Safety	Following OSHA standards in any health and safety related activity is an allowable expense and required by state and federal law.	See OSHA Standards MSDS must be posted wherever workers may be exposed to hazardous materials. In addition, all contractors and staff must abide by the OSHA Hazard Communication Standard found at: https://www.osha.gov/dsg/hazcom/index.html	Grantees must perform assessments to determine if crews are utilizing safe work practices. Assessments will be conducted during routine monitoring in the field to ensure all workers are properly trained and performing work under OSHA standards.	If OSHA rules cannot be followed for whatever reason, the job must be deferred.	Not applicable.	OSHA 10 hour training is required for all workers. OSHA 30 hour training is required for crew leaders. Training will include Confined Space Awareness.
Pests	Pest removal is allowed only where infestation would prevent weatherization. Screening of windows and points of access is allowed to prevent intrusion.	To be an eligible expense, pest removal must be reasonable assured of long term success and cost no more than \$400.	Assessment of presence and degree of infestation and risk to worker.	Infestation of pests may be cause for deferral where it cannot be reasonably removed or poses health and safety concern for workers.	Inform client of observed condition and associated risks.	How to assess presence and degree of infestation, associated risks, and need for deferral.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Radon	Vapor barriers and other precautionary measures intended to prevent the exacerbation of radon problems are allowable H&S costs. Radon mitigation is not an allowable H&S cost. Radon testing is not an allowable cost.	When site conditions permit exposed dirt must be covered with a vapor barrier (not including mobile homes). Vapor barriers must be sealed at the seams and to sidewalls and other penetrations to the fullest extent possible. In homes where radon may be present, precautions should be taken to reduce the likeliness of making radon issues worse, including sealing sump pumps and cracks, air sealing between crawl and conditioned space, ventilation and air balancing strategies	Testing is recommended by the client but is not an allowable expense under the Delaware WAP.	Homes with documented radon problems may be deferred if measures are expected to aggravate existing radon problems or precautionary measures are likely to be ineffective.	Provide client with EPA consumer's guide to radon. Clients may also be referred to the Delaware Healthy Homes program at http://dhss.delaware.gov/dph/hsp/hhinsideradon.html	Contractors should be trained in radon occurrence and precautions.
Refrigerant	Reclaiming refrigerant is an allowable H&S cost, however it will normally not be a H&S cost unless the replacement or repair is done as a H&S measure	Reclaiming practices should be done in accordance with the 1990 Clean Air Act, section 608, as amended, and all other state and federal statutes	EPA testing protocols.	N/A	Clients should be informed not to disturb refrigerant.	EPA-approved section 608 type I or universal certification.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Smoke, Carbon Monoxide Detectors, and Fire Extinguishers	Installation of smoke/CO detectors is allowed where detectors are not present or are inoperable. Replacement of operable smoke/CO detectors is not an allowable cost. Providing fire extinguishers is allowed only when solid fuel is present, and where, at the discretion of the auditor, they are needed.	Installation of smoke/CO detectors shall be in accordance with the DE Field Guide, which requires a smoke alarm on each floor and CO capabilities in proximity to any combustion appliance	Check for presence and operation.	Deferral is recommended where the homeowner refuses the installation of detectors.	Provide client with verbal and written information on use of smoke/CO detectors and fire extinguishers where allowed.	Where to install detectors. Local code compliance.
Solid Fuel Heating (Wood Stoves, etc.)	Maintenance, repair, and replacement of primary indoor heating units is allowed where occupant health and safety is a concern. Maintenance and repair of secondary heating units is not allowed. Chimney sweeps will also be allowed as a health and safety measure.	Maintenance, repair, and replacement are only allowed where excessive smoke or exhaust gases are leaking into the home and causing a health concern.	Required inspection of chimney and flue and combustion appliance zone depressurization.	Deferral is recommended in instances where chimney or flue work is excessive (costing more than 50% of the unit itself).	Provide safety information including recognizing depressurization.	How to perform CAZ depressurization test and proper inspection.
Space Heaters, Stand Alone Electric	Repair, replacement, or installation is not allowed. Removal is recommended.	N/A	Check circuitry to ensure adequate power supply for existing space heaters if removal is not allowed by client.	Deferral would not normally be recommended or required unless space heaters are damaged, being misused, located in unsafe location, etc. and the client refuses removal.	Inform client of hazards. Obtain a signed waiver if not removed.	Awareness of guidance.
Space Heaters, Unvented Combustion	Removal is required.	N/A	N/A	Deferral is required where removal is declined by the homeowner or other heating means are unavailable. Referral to heating assistance programs is advised.	Inform client of dangers of unvented space heaters - CO, moisture, NO2, CO can be dangerous even if CO alarm does not sound.	How to perform air-free CO testing. Understanding the dangers of unvented space heaters.

Health and Safety Issue	Allow ability	Standard or Criteria	Testing	Standards for Deferral or Referral	Client Education	Training
Space Heaters, Vented Combustion	Such units should be treated as furnaces.	N/A	Venting should be tested consistent with furnaces.	N/A	N/A	See above
Ventilation	Ventilation installation, repair and replacement is an allowable expense under Delaware's H&S plan. Full compliance with ASHRAE 62.2 must be emplaced by March 31, 2013. Section 6 below outlines the acceptance of the DOE Memorandum 007-Addendum B and the updated language regarding ASHRAE 62.2 (2013).	Ventilation existing in homes should be repaired or replaced if not functioning. If the building is tested at or below the BTL as calculated by the auditor, and no air sealing of the home should be done and supplemental ventilation must be added to the home if such installation can be done for \$500 or less. All ventilation systems must be vented to the exterior of the home as detailed in the Field Guide.	Fan flow may be tested and is an allowable expense.	Deferral may be required where ventilation costs are expected to exceed the allowable limit as determined at the time of the initial audit. Where homes show signs of inadequate ventilation, and the unit is otherwise deferred, the homeowner should be referred to the Division of Public Health Healthy Homes program for further information.	Provide info on importance of adequate ventilation, function, use, and maintenance of vent system. Include disclaimer that ventilation does not account for high polluting sources or guarantee indoor air quality.	Auditors must be trained in calculating ASHREA 62.2 (2013) standards and how to observe for signs of poor ventilation and/or where to add ventilation to most effectively increase home's airflow. Refer to Section 6 below, DOE Acceptance of ASHRAE 62.2-2013 Addendum B.
Window and Door Replacement, Window Guards	Replacement, repair, or installation is not an allowable health and safety cost but may be allowed as an incidental repair or an efficiency measure if cost justified.	N/A	N/A	N/A	Provide information on lead risks.	Awareness of guidance.

**Delaware Weatherization Assistance Program
Client Health and Safety Survey**

Client Name: _____

Address: _____ County _____

Phone #: _____ (home) _____ (cell/other)

The Delaware Weatherization Assistance Program (WAP) assists low income homeowners and individuals ("Clients") with making their homes more energy efficient, thereby increasing their comfort and saving money on energy bills. In the process, we work to ensure their health and safety to the best of our ability.

As a client in the Delaware WAP, I understand that my health and safety, and that of the WAP staff and contractors is a critical component of the Delaware WAP and that any and all weatherization activities, retrofit materials, techniques or practices will be conducted to minimize any health and safety concerns and environmental impacts.

Part 1 – to be completed at client eligibility intake

To provide safe and effective services, it's necessary to have a sense of the client's health, and knowledge of any health concerns you have with your home. Therefore, please check the appropriate boxes below and inform the auditor or intake worker with any health concerns you may have with weatherizing your home.

- ☐ Chronic allergies _____
- ☐ Breathing problems (COPD, Emphysema, etc...) _____
- ☐ High blood lead levels _____
- ☐ Wheelchair accessibility needs _____
- ☐ Mold or other safety concerns in the home _____
- ☐ Moisture problems (please be room specific) _____
- ☐ Other concerns _____

Part 2 (see reverse side) – to be completed by the auditor

At the beginning of the energy audit, the auditor should perform an initial assessment of the home for health and safety concerns, as well as overall energy conservation opportunities and any causes for deferral of the unit. Health and safety issues may or may not be reason for deferral of the home, the decision of which is made by the auditor during their initial assessment.

A checklist for use by the auditor is shown on the reverse of this page. The auditor should fill it out noting any and all health and safety concerns observed. In addition, the auditor should discuss his or her findings with the homeowner or renter to ensure they understand the findings and can make any corrective actions necessary. If the conditions in the home are such that deferral is needed, the homeowner will be provided the reasons for deferral on a separate notification form. The client must sign this form, which must then be entered in the client's file. Client refusal to sign should be noted and signed off on by the local agency program manager.

Client Name _____ Address _____ Date Audit Conducted _____

Exterior site inspection	Attic Inspection	Interior Inspection	Combustion Appliances	Garage/Storage	Basement/ Crawlspace Inspection
<ul style="list-style-type: none"> _ Structural, _ Roofing, _ Site drainage, _ Gutters, _ Potential asbestos siding, _ Pest intrusion 	<ul style="list-style-type: none"> _ Recessed and canned lighting _ Chimney/ flue shielding _ Structural and code concerns _ Wiring hazards, including knob and tube _ Adequate ventilation _ Water leaks and moisture problems _ Pest and biologicals _ Vermiculite & potential asbestos _ Fire hazards _ Other 	<ul style="list-style-type: none"> _ Wiring _ Water leaks _ Moisture problems _ Potential mold _ Lead based paint _ Structural and code concerns _ Fire hazard _ Indoor air concerns (improper venting, poor HVAC return sealing/locations _ Other 	<ul style="list-style-type: none"> _ Proper venting _ Draft problems _ Fire hazards _ Combustibles 	<ul style="list-style-type: none"> _ VOCs _ Hazardous chemicals _ Potential air intrusion into home 	<ul style="list-style-type: none"> _ Vapor barrier _ Wiring _ Water leaks and moisture problems _ Plumbing leaks _ Structural and code concerns _ Potential asbestos _ Fire hazards _ Other

NOTES _____

I have been advised of the above health and safety findings of the Delaware WAP auditor and understand that these findings are preliminary, and do necessarily reflect all of the health and safety concerns found within my home, or the severity of the concern. For items that cannot be addressed through allowable health and safety provisions of WAP, the financial responsibility for correcting these issues are mine and that all corrections should be performed in a professional manor and to code, and may require a licensed professional.

Clients Printed Name

Client Signature

Date

6. ASHRAE 62.2

Delaware has fully implemented ASHRAE 62.2 (2013) for Program Year 2015. We have spent the last two years getting comfortable with the 2010 standard and have also now received additional training (November 2014) in the 2013 version.

DOE Acceptance of ASHRAE 62.2-2013 Addendum B

WHOLE-BUILDING MECHANICAL VENTILATION RATE

The required mechanical ventilation rate, Q_{fan} , shall be the rate Q_{tot} in Section 4.1.1 plus the required additional airflow calculated in accordance with Section A3. If the airtightness of the building envelope has been measured, the required mechanical ventilation rate may be reduced as described in Section 4.1.2. In these cases, Section A3 shall be applied before Section 4.1.2 when determining the final mechanical ventilation rate. For existing buildings, if Q_{fan} is less than or equal to zero ~~15 cfm~~, then ~~no~~ whole-building ventilation ~~fan~~ is **not** required.

11. APPENDIX C

STATE OF DELAWARE
DEPARTMENT OF NATURAL RESOURCES AND ENVIRONMENTAL CONTROL
DIVISION OF ENERGY AND CLIMATE
WEATHERIZATION ASSISTANCE PROGRAM AUTHORIZATION AND RELEASE FORM
FOR TENANT-OCCUPIED PROPERTY

(Landlord Name)

(Hereinafter referred to as the Landlord) hereby certifies that he/she/they are the owner(s) of the property located at:

(Full address including apartment number)

Currently occupied by _____ Tenant(s) Name(s)

(Hereinafter referred to as the Tenant) applicant for the Weatherization Assistance Program with

(AGENCY NAME) _____ hereinafter referred to as the Contractor Agency.

- A. The Landlord herein certifies that he/she/does not have the resources or ability to perform the necessary energy-related repairs and/or improvements on the dwelling unit.
- B. The Landlord and Tenant agree:
- a. To authorize the contractor agency, their staff and subcontractors to install energy efficiency improvements as necessary to the property for the purpose of conserving energy and reducing energy costs to the Tenant;
 - b. To allow the contractor agency access to the property at reasonable times to provide weatherization assistance and to make necessary inspections as required by program regulations;
 - c. To hereby release and agree to indemnify and hold harmless the contractor agency, its staff, and subcontractors from any liability in connection with the performance of the work;
 - d. To authorize the contractor agency to receive statements from the fuel supplier for the dwelling unit in order to determine the quantity of fuel consumed in each of the past three (3) years and for the three years subsequent to weatherization services. The data will be used for evaluation purposes only to determine the cost of effectiveness of the weatherization program.
- C. Further, the Landlord agrees:

- e. That rents shall not be raised due to the increased value of the dwelling unit due solely to weatherization assistance services provided by contractor agency;
 - f. That upon completion of weatherization assistance of the dwelling unit by contractor agency, the Tenant shall not be evicted or otherwise requested to leave the dwelling unit for a period of one (1) year from the date of the completion of weatherization assistance, so long as the Tenant complies with all obligations and responsibilities under the current rental/lease agreement;
 - g. To pay the contractor agency within one (1) year, an amount equal to the total cost of the weatherization assistance performed on the dwelling unit as evidenced by the submission of a bill of the total cost from the contractor agency, if the rent is increased within the 12 month period after the weatherization assistance has been performed;
 - h. To pay the contractor agency, within one (1) year, an amount equal to the total cost of the weatherization assistance performed on the dwelling unit, as evidenced by the submission of a bill of the total costs from the contractor agency, if the dwelling unit (including a mobile home) is sold or otherwise transferred within a 12 month period after weatherization and/or retrofit services have been performed; and
 - i. To pay the contractor agency, within one (1) year, an amount equal to the total cost of the weatherization assistance performed on the dwelling unit, as evidenced by the submission of a bill or the total cost from the contractor agency, if the dwelling unit is a mobile home that is moved out of the State of Delaware within a 12 month period after weatherization and/or retrofit services have been performed.
- D. The contractor agency agrees to perform weatherization assistance allowable under the Department of Energy (DOE) guidelines and will not charge anyone for labor or materials, except as noted in Section C above.

Date

Landlord or Authorized Agent

Date

Landlord or Authorized Agent

Date

Landlord or Authorized Agent

LANDLORD/TENANT INFORMATION SHEET

PLEASE CAREFULLY FILL OUT THE BELOW INFORMATION AND RETURN IT IN THE ENVELOPE PROVIDED WITHIN THE NEXT TEN BUSINESS DAYS. IF ALL INFORMATION IS NOT COMPLETED, THE FORM WILL NOT BE ACCEPTED AND WILL RESULT IN YOUR NAME BEING MOVED TO THE END OF THE WEATHERIZATION LISTING. PLEASE PRINT CLEARLY.

1. _____
LANDLORD'S FULL NAME

2. _____
LANDLORD'S COMPLETE ADDRESS

3. _____
LANDLORD'S BUSINESS TELEPHONE NUMBER

4. _____
LANDLORD'S HOME/CELLULAR TELEPHONE NUMBER

1. _____
TENANT'S FULL NAME & SOCIAL SECURITY NUMBER

2. _____
TENANT'S COMPLETE ADDRESS

3. _____
TENANT BUSINESS TELEPHONE NUMBER

4. _____
TENANT'S HOME/CELLULAR TELEPHONE NUMBER

12. APPENDIX D



CATHOLIC CHARITIES
Diocese of Wilmington



WEATHERIZATION ASSISTANCE PROGRAM – PROGRAM DEFERRAL NOTIFICATION

Client Number:			
Client Name:			
Address:		County:	
Phone #:			

DEFERRAL REASON: (CHECK ALL THAT APPLY)

- ☐ Structurally unsound dwelling
- ☐ Evidence of substantial, persistent infestations of rodents, insects, and other vermin
- ☐ Electrical or plumbing hazards that cannot be resolved prior to, or as a part of, weatherization services
- ☐ Environmental hazards such as serious moisture problems, suspected mold, carbon monoxide, gas leaks, friable asbestos, or other hazardous materials
- ☐ Presence of sewage in any part of the dwelling unit, basement, or crawlspace
- ☐ Presence of animal feces in any area of the dwelling unit where program staff must perform weatherization measures
- ☐ Excessive garbage buildup in and around dwelling unit which limits the program staff access to dwelling and encourages rodent infestations
- ☐ Areas of the home are inaccessible due to clutter, belongings, furnishings or other items blocking or preventing access for weatherization
- ☐ An overt threat of violence to any program staff member or any household member during weatherization process
- ☐ Major Remodeling in Progress – limits proper completion of weatherization measures
- ☐ Excessive moisture or standing water in crawl space or basement
- ☐ Uncooperative client: refuses major weatherization measure or refuses to make modifications necessary to permit major measure to be completed
- ☐ Client no longer interested in the program
- ☐ The expected need for incidental repairs to protect weatherization measures will exceed \$400.
- ☐ Presence or use of any controlled substance in the dwelling during the weatherization process
- ☐ The following other reason(s) for deferral:

Auditor/Installer Signature _____ **DATE** _____

Auditor Installer name and company (Please print) _____

RE AUDIT FINDINGS

- ☐ All checked items above have been cleared and unit can begin weatherization.
- ☐ Deferral items not corrected. Unit deferred.

Auditor Signature _____ **DATE** _____

13. APPENDIX E

PROGRAMMATIC AGREEMENT AMONG THE UNITED STATES DEPARTMENT OF ENERGY, THE DELAWARE DIVISION OF CLEAN ENERGY AND CLIMATE POLICY, and THE DELAWARE STATE HISTORIC PRESERVATION OFFICE REGARDING EECBG, SEP AND WAP UNDERTAKINGS

WHEREAS, the United States Department of Energy (DOE) administers the following financial assistance programs: the Energy Efficiency and Conservation Block Grant Program under the Energy Independence and Securities Act of 2007 (EECBG); the State Energy Plan under the Energy Policy and Conservation Act of 1975 and the State Energy Efficiency Programs Improvement Act of 1990 (SEP); and the Weatherization Assistance Program (WAP) for Low-Income Persons under Title IV of the Energy Conservation and Production Act, the Energy Policy Act of 2005, the Energy Independence and Security Act of 2007, and the American Recovery and Reinvestment Act of 2009 (ARRA); collectively referred to as the "Programs;" and

WHEREAS, the unprecedented levels of funding available to the Programs, due in large measure to ARRA, has created a large volume of projects requiring expedited historic preservation reviews to ensure the timely obligation of funds, that create new jobs, and improve local and state economies; and

WHEREAS, the Delaware State Historic Preservation Office (SHPO) is experiencing unprecedented numbers of requests for historic preservation review of undertakings funded by all Federal Agencies, including undertakings funded by the Programs; and

WHEREAS, THE Delaware Division of Clean Energy and Climate Policy (Recipient) is receiving financial assistance from DOE to carry out the Programs; and

WHEREAS, the projects funded by the Programs are undertakings subject to review under Section 106 of the National Historic Preservation Act, 16 U.S.C 470f (NHPA) and its implementing regulations at 36 CFR Part 800 and include rehabilitation, energy efficiency retrofits, renewables, and weatherization (Undertakings); and

WHEREAS, DOE has determined that these Undertakings may adversely affect properties that are listed in or eligible for listing in the National Register of Historic Places (National Register) and subject to the requirements of the National Historic Preservation Act (NHPA); and

WHEREAS, in accordance with 36 CFR 800.14(b)(4), the Advisory Council on Historic Preservation (the ACHP) has designated this Agreement as a Prototype Programmatic Agreement (PA), which does not require the participation or signature of the ACHP; and

WHEREAS, DOE, the ACHP, and the National Conference of State Historic Preservation Officers (NCSHPO) have determined that the requirements of Section 106 can be more effectively and efficiently fulfilled if a programmatic approach is used to stipulate roles

and responsibilities, exempt undertakings from Section 106 review, establish tribal protocols, facilitate identification and evaluation of historic properties, establish treatment and mitigation measures, and streamline the resolution of adverse effects; and

WHEREAS, by memorandum dated August 28, 2009 (attached as Appendix C), DOE delegated certain tasks necessary for compliance with Section I06 of the NHPA to grantees and sub-grantees of funding from the Programs (Recipients); and

WHEREAS, according to the August 28, 2009 memorandum, the Recipients are authorized, to initiate Section 106 compliance in accordance with 36 CFR 800.2 (c)(4); and

WHEREAS, the undertakings covered under this PA are not located on Tribal lands and are primarily smaller scale activities and routine projects, without the potential for adversely affecting historic properties, rather than complex undertakings with a greater potential to adversely affect historic properties, which would require completion of the typical Section 106 review process; and

WHEREAS, DOE and the ACHP were guided by the principles set forth in the ACHP's Affordable Housing Policy statement, adopted on November 9, 2006, in negotiating this Programmatic Agreement upon which this PA is based; and

NOW, THEREFORE, DOE, the Recipient, and the SHPO agree that the Programs shall be administered in accordance with the following stipulations to satisfy DOE's Section I06 responsibilities for all individual Undertakings of the Programs.

STIPULATIONS

DOE, the Recipient, and the SHPO shall ensure that the following stipulations are carried out:

I. Roles and Responsibilities

- A. DOE shall be responsible for providing oversight of the PA, executing PAs with SHPOs, participating in the resolution of disputes between the SHPO and the Recipient, and providing technical assistance and guidance as needed. DOE shall be responsible for government-to-government consultation with Indian tribes, unless the Indian tribe agrees to the delegation of this responsibility to a Recipient.
- B. The Recipient shall be responsible for consulting with consulting parties and conducting Section I06 reviews in a timely manner, preparing documentation for the SHPO and DOE, and maintaining records on Undertakings. Undertakings that involve properties greater than fifty (45) years old and are not listed on either Appendices A or B shall be submitted to the SHPO for review in accordance with this agreement.
- C. Recipient shall ensure that the provisions of this PA apply to its sub-awards.
- D. The Recipient is encouraged to use qualified professionals in conducting their Section I06 requirements.

- E. The SHPO shall be responsible for reviewing project documentation and participation in consultation as set forth in this PA
- F. The ACHP shall be responsible for providing technical guidance, participating in dispute resolutions if appropriate, and monitoring the effectiveness of this PA

2

II. Tribal Review

- A. Execution of this PA presumes that DOE will conduct its government-to-government responsibilities with federal recognized Indian tribes consistent with Federal laws and regulations. The Recipient shall not substitute for DOE in matters related to potential effects on historic properties of cultural and religious significance to Indian tribes, except with the concurrence of the Indian tribe.
- B. DOE acknowledges that Indian tribes possess special expertise in assessing the National Register eligibility of properties with tribal religious and cultural significance, and requires the Recipient to consult with them, as appropriate, in identifying historic properties listed in or eligible for listing in the Area of Potential Effect (APE) of program areas.
- C. If the Recipient notifies DOE that an undertaking may result in an adverse effect on cultural resources with tribal religious and cultural significance, DOE shall notify Indian tribes of individual undertakings that may result in an adverse effect on cultural resources with tribal religious and cultural significance and invite them to participate in consultations. Indian tribes and the Recipient may develop a bi-party agreement that outlines their review procedures for undertakings covered in a PA. Such agreements will be submitted to DOE for review and approval, and a copy sent to the ACHP for its records.

III. Exemptions from Section 106 Review

- A. The Recipient shall not submit to the SHPO undertakings in accordance with Appendices A or B as they do not have the potential to cause effects on historic properties even when historic properties may be present. The Recipient and the SHPO may agree to modify Appendix A and/or Appendix B, with advance notification of such modifications to the ACHP and DOE. Recipient will maintain file records with verification that undertakings were determined to be exemptions for a period of three (3) years from project completion and make them available for review if requested by DOE or the ACHP.
- B. If a property has been determined to be ineligible for inclusion in the National Register within the last five (5) years from the date the Recipient made its application for DOE financial assistance, then no further review is required under this PA.
- C. Recipients of any of the Programs may utilize either Appendix A or Appendix B in identifying exempt undertakings, regardless of whether the Exhibit on which the undertaking relates to another federally funded program.

IV. Review Procedures for Non-exempt Undertakings

- A. For undertakings not exempted under Stipulation III, if the Recipient has an executed Section 106 Agreement per 36 CFR Part 800 for Community Development Block Grants (CDBG) with the SHPO that 1) is still in effect; 2) covers the same undertakings as the DOE grant programs; and 3) is up to date with reporting to the SHPO, no separate Section 106 review is needed.
- B. Otherwise, the Recipient shall review the Undertaking in accordance with Stipulations V through IX below, or consistent with SHPO approved historic preservation protocols.

V. Identification and Evaluation

- A. The Recipient shall establish the Area of Potential Effect (APE) for all program undertakings defined in the DOE grant agreement for the State.
- B. The Recipient shall complete the identification and evaluation of historic properties utilizing existing information including the National Register, state surveys, and county and local surveys. In addition, the Recipient and SHPO may use or develop protocols that are consistent with 36 CFR Section 800.4 for the review of consensus determinations of eligibility.
- C. The Recipient shall consult with Indian tribes to determine if there are historic properties of religious or cultural significance that were not previously identified or considered in surveys or related Section 106 reviews, as appropriate.
- D. Archaeology surveys are required only for new ground disturbing project undertakings and shall be limited in scope subject to the concurrence of Indian tribes that may attach religious or cultural significance to historic properties in the project area. Project undertakings requiring more than minimal ground disturbance shall be forwarded to the SHPO and THPOs or Indian tribes concurrently for review.
- E. In order to avoid potential delays, prior to initiating undertakings the SHPO may review the Recipient's scopes of work for above ground surveys and archaeology surveys that are deemed necessary to administer the Recipient's Programs and to implement the terms of this PA.
- F. The Recipient shall refer disputes regarding determinations of eligibility to DOE for review and referral to the Keeper of the National Register in accordance with 800.4(c)(2).

VI. Treatment of Historic Properties

- A. When the Recipient and the SHPO concur that an Undertaking is designed and planned in accordance with the Secretary of the Interior's *Standards for the Treatment of Historic properties* (36 CFR Part 68, July 12, 1995 *Federal Register*) (Standards), that Undertaking will not be subject to further Section 106 review.

- B. The Recipient and SHPO will make best efforts to expedite reviews through a finding of "No Adverse Effect with conditions" when the Recipient and the SHPO concur that plans and specifications or scopes of work can be modified to ensure adherence to the Standards. If the undertaking cannot meet the Standards or would otherwise result in an adverse effect to historic properties, the Recipient will proceed in accordance with Stipulation VII.

VII. Resolution of Adverse Effects

- A. The Recipient shall consult with the SHPO, and Indian tribes as appropriate, to resolve adverse effects. The Recipient will notify DOE of the pending consultation, and DOE will participate through its designated representative.
- B. The Recipient may use standard stipulations included in Attachment A of this PA, or as negotiated as part of this PA between the SHPO and the Recipient, or if the project warrants, use of an alternate PA due to the complexity of the project activity.
- C. Consultation shall be coordinated to be concluded in 45-days or less to avoid the loss of funding. In the event the consultation extends beyond this period, DOE shall formally invite the ACHP to participate in consultation. The ACHP will consult with DOE regarding the issues and the opportunity to negotiate a Memorandum of Agreement (MOA). Within seven (7) days after notification, the ACHP will enter consultation and provide its recommendation for either concluding the Section I 06 review through an MOA or Chairman's comment from the ACHP to the Secretary of DOE within 21 days.
- D. In the case of an ACHP Chairman comment, DOE may proceed once DOE provides its response to the ACHP.

VIII. Emergency Situation Undertakings

When an emergency undertaking is required for historic properties associated with the undertakings, the Recipient shall allow SHPO five (5) business days to respond, if feasible. Emergencies exist when there is a need to eliminate an imminent threat to health and safety of residents as identified by local or county building inspectors, fire department officials, or other local or county officials.

- 1. . The Recipient shall forward documentation to the SHPO for review immediately upon notification that an emergency exists. Documentation should include a) nature of the emergency; b) the address of the historic property involved; c) photographs showing the current condition of the building; and d) the time-frame allowed by local officials to respond to, or correct, the emergency situation.
- 2. The Recipient shall consider mitigation measures recommended by the SHPO and implement them, if feasible.

IX. Public and Consulting Party Involvement

- A. The Recipient shall maintain a list of undertakings and shall make the documentation available to the public. The Recipient shall notify the SHPO if it's notified of other consulting parties or public interest in any Undertakings covered under the terms of the PA.
- B. The Recipient, independently or at the recommendation of the SHPO, may invite interested persons to participate as consulting parties in the consultation process for adverse effects in accordance with Stipulations V, VI, and VII.

X. Administrative Coordination

- A. The Recipient, in consultation with the SHPO, may develop procedures allowing for the use of local reviews conducted by Certified Local Governments (CLG) when such procedures avoid the duplication of efforts.
- B. The Recipient, in consultation with the SHPO, may determine that an Undertaking has already been reviewed under an existing Section 106 effect determination or agreement document, no further Section 106 review under this PA is required.
- C. The SHPO shall provide comments to the Recipient within thirty (30) days, unless otherwise agreed upon by the SHPO and the Recipient, for reviews required under the terms of this PA with the exception of emergency undertakings. In the event that the SHPO fails to comment within the established period, the Recipient can assume the SHPO has concurred, and proceed.
- D. The Recipient shall advise sub-grantees in writing of the provisions in Section 110 (k) of the Act and will advise the sub-grantees that Section 106 reviews may be compromised when project undertakings are initiated prematurely.
- E. The SHPO and the Recipient shall make every effort to expedite Section 106 reviews for a period of less than the 30-day review when consistent with the terms of the DOE grant agreements and the Recipient intends to utilize the services of qualified professionals.
- F. For projects that will require either an Environmental Assessment or an Environmental Impact Statement under the National Environmental Policy Act (NEPA), nothing contained in this PA shall prevent or limit the Recipient and DOE from utilizing the procedures set forth in 36 CFR 800.8 to coordinate and conduct the historic preservation review in conjunction with the NEPA review.

XI. Discoveries

If historic properties are discovered or unanticipated effects on historic properties located within a project's APE after the undertaking has been initiated, the Recipient will implement the following procedures:

- A. The Recipient shall immediately cease all operations for the portion of the undertaking with the potential to affect an historic property;
- B. The sub-grantee shall advise the Recipient of the National Register eligibility of the historic property and the potential of the Undertaking to impact its qualifying characteristics and an explanation of the whether the SHPO or Indian tribes concur with proposed avoidance, treatment plan or mitigation plan;
- C. The Recipient or DOE shall notify Indian tribes of any discoveries that have the potential to adversely affect sites or buildings of religious or cultural significance to them. After reviewing such discoveries, the Indian tribes can request further consultation on the project by notifying DOE, ACHP, and the SHPO in writing.
- D. The Recipient or sub-grantee shall implement the avoidance, treatment or mitigation plan and shall advise the Recipient and DOE, if appropriate, of the satisfactory completion of the approved work. Once the approved work is complete may resume the activities that were halted to address the discovery situation.

XII. Dispute Resolution

- A. Should the SHPO object within the time frames outlined in this PA to any project Undertakings, the Recipient shall consult further with the SHPO to attempt to remove the basis for the SHPO's objection. In the event that the SHPO's objection is not withdrawn, then the Recipient shall refer the matter to DOE. The Recipient shall forward all documentation relevant to DOE, who will notify and consult with the ACHP.
- B. The ACHP will provide its recommendations, if any, within 21 days following receipt of relevant documentation. DOE will take into account the ACHP's recommendations or formal comments in reaching a final decision regarding the dispute.

XIII. Reporting and Monitoring

- A. DOE, the ACHP, and the SHPO may monitor any Undertakings carried out pursuant to this PA. The ACHP may review Undertakings, if requested by DOE. DOE shall be entitled to address and make determinations on overall policy or administrative issues related to the implementation of these Programs.
- B. The recipient shall adhere to DOE's established protocols for ARRA reporting program undertakings.

- C. DOE will submit annual reports to ACHP and NCSHPO commencing October 15, 2010 summarizing the Programs' Undertakings, to include data on number of Undertakings, the number of exempt Undertakings, and reviews conducted under this PA.

XIV. Amendments

DOE, the SHPO, or the Recipient may request that this PA be amended, whereupon DOE and the SHPO, and the ACHP, if involved, will consult to consider such an amendment. Any such amendments shall be developed and executed among DOE, the Recipient, and the SHPO in the same manner as the original PA, and pertain only to this State PA.

XV. Duration of Agreement


This PA will be valid for three (3) years from the date of execution, as verified with DOE filing the PA with the ACHP.

XVI. Termination of Agreement

DOE, the SHPO, or the Recipient may terminate the PA, provided that the party proposing termination notifies the other signatories and the ACHP in writing explaining the reasons for termination and affording the other signatories at least thirty (30) days to consult and seek alternatives to termination.

Signatories:

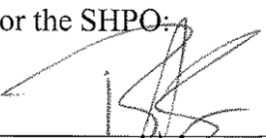
For the Recipient:



Carolyn Snyder, Director, Division of Clean Energy and Climate Policy,
Delaware Department of Natural Resources and Environmental Control

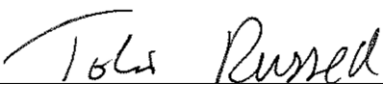
8/6/10

For the SHPO:



Timothy A. Slavin, Director, Division of Historical and Cultural Affairs and Delaware State Historic
Preservation Officer

8/23/10



UNITED STATES DEPARTMENT OF ENERGY
OFFICE OF ENERGY EFFICIENCY AND RENEWABLE ENERGY
OFFICE OF WEATHERIZATION AND INTERGOVERNMENTAL PROGRAMS

8/23/10

APPENDIX A - WAP UNDERTAKINGS EXEMPT FROM SECTION 106 REVIEW

All undertakings will be done in accordance with applicable local building codes or the International Building Code, where applicable. In accordance with 36 CFR 800.3(a)(1), the following undertakings have been determined to have no potential to cause effects on historic properties:

A. Exterior Work

1. Air sealing of the building shell, including caulking, weather-stripping, and other air infiltration control measures on windows and doors, and installing thresholds in a manner that does not harm or obscure historic windows or trim.
2. Thermal insulation, such as non-toxic fiberglass and foil wrapped, in walls, floors, ceilings, attics, and foundations in a manner that does not harm or damage historic fabric.
3. Blown in wall insulation where no holes are drilled through exterior siding, or where holes have no permanent visible alteration to the structure.
4. Removable film on windows (if the film is transparent), solar screens, or window louvers, in a manner that does not harm or obscure historic windows or trim.
5. Reflective roof coating in a manner that closely resembles the historic materials and form, or with materials that restore the original feature based on historic evidence, and in a manner that does not alter the roofline, or where not on a primary roof elevation or visible from the public right-of-way.
6. Storm windows or doors, and wood screen doors in a manner that does not harm or obscure historic windows or trim.
7. In-kind replacement or repair of primary windows, doors and door frames that closely resemble existing substrate and framing.
8. Repair of minor roof and wall leaks prior to insulating attics or walls, provided repairs closely resemble existing surface composite.

B. Interior Work

Special Note: Undertakings to interior spaces where the work will not be visible from the public right-of-way; no structural alterations are made; no demolition of walls, ceilings or floors occurs; no drop ceilings are added; or no walls are leveled with furring or moved, should be automatically excluded from SHPO review.

1. Energy efficiency work within the building shell:

- a. Thermal insulation in walls, floors, ceilings, attics, crawl spaces, ducts foundations.
- b. Blown in wall insulation where no decorative plaster is damaged.
- c. Plumbing work, including installation of water heaters.
- d. Electrical work, including improving lamp efficiency.
- e. Sealing air leaks using weather stripping, door sweeps, and caulk and sealing major air leaks associated with bypasses, ducts, air conditioning units, etc.
- f. Repair or replace water heaters.
- g. Adding adjustable speed drives such as fans on air handling units, cooling tower fans, and pumps.
- h. Install insulation on water heater tanks and water heating pipes.
- i. Install solar water heating systems, provided the structure is not visible from the public right-of-way.

- j. Install waste heat recovery devices, including Desuperheater heater water heaters, condensing heat exchangers, heat pump and water heating heat recovery systems, and other energy recovery equipment.
- k. Repair or replace electric motors and motor controls like variable speed drives.
- l. Incorporate other lighting technologies such as dimmable ballasts, day lighting controls, and occupant controlled dimming.

2. Work on heating and cooling systems:

- a. Clean, tune, repair or replace heating systems, including furnaces, oilers, heat pumps, vented space heaters, and wood stoves.
- b. Clean, tune repair or replace cooling systems, including central air conditioners, window air conditioners, heat pumps, and evaporative coolers.
- c. Install insulation on ducts and heating pipes.
- d. Conduct other efficiency improvements on heating and cooling systems, including replacing standing pilot lights with electronic ignition devices and installing vent dampers.
- e. Modify duct and pipe systems so heating and cooling systems operate efficiently and effectively, including adding return ducts, replace diffusers and registers, replace air filters, install thermostatic radiator controls on steam and hot water heating systems.
- f. Install programmable thermostats, outdoor reset controls, UL listed energy management systems or building automation systems and other HVAC control systems.

3. Energy efficiency work affecting the electric base load of the property:

- a. Convert incandescent lighting to fluorescent.
- b. Add reflectors, LED exist signs, efficient HID fixtures, and occupancy (motion) sensors.
- c. Replace refrigerators and other appliances.

4. Health and safety measures:

- a. Installing fire, smoke or carbon dioxide detectors / alarms.
- b. Repair or replace vent systems on fossil-fuel-fired heating systems and water heaters to ensure that combustion gasses draft safely to outside.
- c. Install mechanical ventilation, in a manner not visible from the public right of way, to ensure adequate indoor air quality if house is air-sealed to building tightness limit.

APPENDIX B - SEP AND EECBG UNDERTAKINGS EXEMPT FROM SECTION 106 REVIEW

CATEGORY I - No Consultation Required

In addition to the Undertakings provided in Appendix A: WAP Undertakings Exempt from Section 106 Review, DOE and the SHPO have concluded that the following undertakings do not have the potential to cause effects on historic properties per 36 CFR § 800.3(a)(1):

1. General efficiency measures not affecting the exterior of the building:

- a. Energy audits and feasibility studies.
- b. Weatherization of mobile homes and trailers.
- c. Caulking and weather-stripping around doors and windows in a manner that does not harm or obscure historic windows or trim.
- d. Water conservation measures -like low flow faucets, toilets, shower heads, urinals - and distribution device controls.
- e. Repairing or replacing in kind existing driveways, parking areas, and walkways with materials of similar appearance.
- f. Excavating to gain access to existing underground utilities to repair or replace them, provided that the work is performed consistent with previous conditions.
- g. Ventilating crawl spaces.
- h. Replacement of existing HVAC equipment including pumps, motors, boilers, chillers, cooling towers, air handling units, package units, condensers, compressors, heat exchangers that do not require a change to existing ducting, plumbing, electrical, controls or a new location, or if ducting, plumbing, electrical and controls are on the rear of the structure or not visible from any public right of way.
- i. Adding or replacing existing building controls systems including HVAC control systems and the replacement of building-wide pneumatic controls with digital controls, thermostats, dampers, and other individual sensors like smoke detectors and carbon monoxide detectors (wired or non-wired).
- j. New installation of non-hard wired devices including photo-controls, occupancy sensors, carbon dioxide, thermostats, humidity, light meters and other building control sensors, provided the work conforms to applicable state and local permitting requirements.
- k. Adding variable speed drive motors.
- l. Insulation of water heater tanks and pipes.
- m. Furnace or hot water tank replacement that does not require a visible new supply or venting.

2. Insulation measures not affecting the exterior of the building:

- a. Thermal insulation installation in walls, floors and ceilings (excluding spray foam insulation).
- b. Duct sealing, insulation, repair or replacement in unoccupied areas.
- c. Attic insulation with proper ventilation; if under an effective R8 - add additional R-19 up to R-38 (fiberglass batt only).
- d. Band joist insulation - R-11 to R19 as applicable.
- e. Water heater tank and pipe insulation.

3. Electric base load measures not affecting the exterior the building:

- a. Appliance replacement (upgrade to Energy Star appliances).
- b. Compact fluorescent light bulbs.
- c. Energy efficient light fixtures, including ballasts (replacement).
- d. LED light fixtures and exit signs (replacement).
- e. Upgrade exterior lighting (replacement with metal halide bulbs, LEDs, or others) along with ballasts, sensors and energy storage devices not visible from any public right-of-way.

CATEGORY 2 - No Consultation Required if Qualified Staff Verify that Work is Consistent with the Secretary of the Interior's Standards for the Treatment of Historic Properties (Standards)

1. Efficiency and repair measures:

- a. Painting over previously painted exterior surfaces, provided destructive surface preparation treatments are not used (such as water-blasting, sandblasting and chemical removal).
- b. Installation or replacement of an extension to a downspout, provided that the color of the extensions is historically appropriate for the period and style of the property.
- c. Repairing or upgrading electrical or plumbing systems and installing mechanical equipment, in a manner that does not permanently change the appearance of the interior or exterior of the building.
- d. Installation of new HVAC equipment (such as pumps, motors, boilers, chillers, cooling towers, air handling units, package units, condensers, compressors, or heat exchangers) in a manner that does not permanently change the appearance of the building.
- e. Integrated shingle-style or thin film solar systems on the rear roof of the structure, behind the parapet or not visible from the public right of way.
- f. Solar systems (including photovoltaic and solar thermal) not visible from the public right-of-way and if ground-mounted can be installed without ground disturbance and if roof-mounted will not require new building reinforcement.
- g. Wind system additions to existing wind power facilities that will not require ground disturbance and if building mounted will not require building reinforcement.
- h. Lead-based paint abatement in accordance with the *Standards and Preservation Brief #37*.
- i. Building cleaning in accordance with the *Standards and Preservation Briefs #1, #6, and #10*.
- j. Repairing masonry, including re-pointing and rebuilding chimneys in accordance with the *Standards and Preservation Brief #2*.
- k. New lighting controls including photo-sensors and shading elements if not visible from the public right-of-way.
- l. New metering devices in a manner that does not permanently change the appearance of the interior or exterior of the building, or if the addition is on the exterior of the structure and is not visible from the public right-of-way.
- m. New water efficient fixtures and fittings in a manner that does not permanently change the appearance of the interior or exterior of the building.

2. Installation or repair of roofing, siding and ventilation:

- a. White Roofs, Cool Roofs, Green Roofs, Sod or Grass Roofs not visible from the public right-of-way.
- b. Rainwater catches and/or gray water systems not viewable from the public right-of-way.
- c. Repair or replacement of existing exterior siding provided that new siding closely resembles the existing siding in dimension, profile and texture.
- d. Flat or shallow pitch roof replacement (shallow pitch is defined as a pitch with a rise-to-run ratio equal to or less than 3" to 12") with no part of the surface of the roof visible from the ground.
- e. Roof repair or replacement with materials that closely resemble the historic materials and form, or with replacement materials that are close to the original in color, texture, composition and form to restore the original feature based on historic evidence, and in a manner that does not alter the roofline.
- f. Installing vents (such as continuous ridge vents covered with ridge shingles or boards, roof vents, bath and kitchen vents, soffit and frieze board vents or combustion appliance flues) if not located on a primary roof elevation or not visible from the public right-of-way.
- g. Installing foundation vents, if painted or finished to match the existing foundation material.

3. Windows and doors:

- a. Installing storm windows, storm doors, or wooden screen doors in a manner that does not harm or obscure historic windows, doors or trim.
- b. Installing insulated exterior replacement doors where the door openings are not altered and are not visible from the public right-of-way.
- c. Window or glazing treatments that do not change the appearance of the interior or exterior of the building, or if the addition is on the exterior of the structure, such as the addition of storm windows.

APPENDIX C- AUGUST 28, 2009
DELEGATION MEMORANDUM

Department of Energy
Washington, DC 20585

August 28, 2009

MEMORANDUM

TO: State Historic Preservation Officers - Tribal Historic Preservation Officers

FROM: Catherine R. Zoi
Assistant Secretary
Energy Efficiency and Renewable Energy

SUBJECT: Memorandum from EERE Regarding Delegation of Authority for Section 106 Review of Undertakings, Assisted by the U. S. Department of Energy, Office of Energy Efficiency and Renewable Energy

The Department of Energy (DOE), through the Office of Energy Efficiency and Renewable Energy (EERE), provides financial assistance to states, U.S. territories, units of local government, and Indian Tribes through the Energy Efficiency and Conservation Block Grant (EECBG) Program, Weatherization Assistance Program (Weatherization), and State Energy Program (SEP). Attached hereto is a one-page summary of the three programs. Additional program information is available at the following links:

<http://www.eecbg.energy.gov/>; <http://apps1.eere.energy.gov/wip/weatherization.cfm>;
<http://apps1.eere.energy.gov/stateenergyprogram/>.

Through this memorandum, DOE intends to formalize the role of the States and DOE's award recipients (Applicants) to assist DOE in carrying out its Section 106 compliance responsibilities. In order to streamline DOE's compliance with Section 106 and its implementing regulations, "Protection of Historic Properties" (36 CFR Part 800), EERE is authorizing its Applicants under the EECBG, Weatherization, and SEP programs to initiate consultation pursuant to 36 CFR § 800.2(c) (4). Effective immediately, EERE Applicants and their authorized representatives may consult with the State Historic Preservation Officers (SHPOs) and Tribal Historic Preservation Officers (THPOs) to initiate the review process established under 36 CFR Part 800 and to carry out some of its steps. Specifically, EERE Applicants are authorized to gather information to identify and evaluate historic properties, and to work with consulting parties to assess effects. EERE retains responsibility to document its findings and determinations in order to appropriately conclude Section 106 review.

EERE also remains responsible for initiating government-to-government consultation with federally recognized Indian Tribes. EERE's responsibility to consult on a government-to-government basis with Indian Tribes as sovereign nations is established through specific authorities and is explicitly recognized in 36 CFR Part 800.

Accordingly, EERE may not delegate this responsibility to a non-federal party without the agreement of the Tribe to do so. Where no such agreement exists, EERE will initiate **tribal consultation**.

Authorized Applicants must notify EERE whenever:

- Either the EERE Applicant or the SHPO/THPO believes that the Criteria of Adverse Effect pursuant to 36 CFR § 800.5, apply to the proposal under consideration by EERE;

- **There is a disagreement between an Applicant, or its authorized representative, and the SHPO/THPO about the scope of the area of potential effects, identification and evaluation of historic properties and/or the assessment of effects;**
- **There is an objection from a consulting party or the public regarding their involvement in the review process established by 36 CFR Part 800, Section 106 findings and determinations, or implementation of agreed upon measures; or**
- **There is the potential for a foreclosure situation or anticipatory demolition as defined under 36 CFR § 800.9(b) and 36 CFR § 800.9(c), respectively.**

EERE will participate in the consultation when such circumstances arise.

EERE expects its Applicants that are so authorized, to involve consulting parties in Section 106 findings and determinations and to carry out the exchange of documentation and information in a respectful, consistent and predictable manner. Technical assistance is available to Applicants from EERE regarding the coordination of Section 106 reviews, if needed.

If you have any questions, please contact Dr. F. G. (Skip) Gosling, DOE Federal Preservation Officer/Chief Historian, Office of History and Heritage Resources, (202) 586-5241 or skip.gosling@ulhq.doe.gov or Steven P. Blazek, NEPA Compliance Officer, (303) 275-4723 or stcvc.blazek@jgo.doc.gov.

STANDARD MITIGATION MEASURES FOR ADVERSE EFFECTS

The Recipient and the SHPO may develop and execute an Agreement that includes one or more of the following Standard Mitigation Measures, as may be modified to a particular activity, with the concurrence of both parties, for Undertakings determined to have an adverse effect on listed or eligible historic resources. The ACHP will not be a party to these Agreements. However, the Recipient must submit a copy of each signed Agreement to the SHPO, and the ACHP within 30 days after it is signed by the Recipient and the SHPO.

1. Recordation

The Recipient shall ensure that the historic property is recorded prior to its alteration in accordance with methods or standards established in consultation with the SHPO. The SHPO shall identify appropriate archive locations for the deposit of recordation materials and the Recipient shall be responsible for submitting required documentation to identified archive locations. The Recipient and the SHPO may mutually agree to waive the recordation requirement in situations where the integrity of the building has been compromised or other representative examples of a similar historic resource have been previously recorded.

2. Architectural Salvage

The Recipient, in consultation with the SHPO, shall identify significant architectural features for salvage, and appropriate parties to receive the salvaged features. The recipient shall ensure that any architectural features identified for salvage are salvaged prior to initiation of Undertakings and properly stored and curated. When feasible and determined appropriate in consultation with SHPO, salvaged architectural features shall be reused in other preservation projects.

3. Rehabilitation

The Recipient shall ensure that the treatment of historic properties which the SHPO has determined does not meet the *Standard*, or SHPO approved design guidelines, is carried out in accordance with treatments agreed upon by the Recipient and the SHPO and are incorporated in the final plans and specifications. The final plans and specifications shall be approved by the SHPO prior to initiating the Undertaking.

4. New Construction

The Recipient shall ensure that the design of new buildings, or additions, which the SHPO has determined does not meet the *Standards*, or SHPO approved design guidelines, is carried out in accordance with the final plans and specifications reviewed and approved by the SHPO prior to initiating the Undertaking.

5. Archaeology

In cases where the Undertaking will cause unavoidable adverse effects to National Register eligible archaeological properties, the Recipient shall consult with the SHPO to determine whether data recovery or some other treatment measure is in the public interest. If data

recovery is the agreed upon treatment measure, the Recipient shall consult further with the SHPO to develop and implement a data recovery plan for those portions of the historic property that will be adversely affected. The data recovery plan shall:

- be based on firm background data, sound planning, and accepted archaeological methods;
- be consistent with applicable State laws and regulations;
- be accomplished in a thorough, efficient manner, using the most cost effective techniques practicable;
- provide for appropriate curation of archeological materials and records, and
- provide for reporting and interpretation of what has been learned in a format understandable and accessible to the public;
- be consistent with the *Secretary of the Interior's Standards and Guidelines for Archaeology and Historic Preservation* (<http://www.nps.gov/history/local-law/archstnds 7.htm>), and shall take into account the ACHP's publications, *Recommended Approach for Consultation on Recovery of Significant Information from Archeological Sites* (1999), ACHP Section 106 *Archaeology Guidance* (<http://www.achp.gov/archguide/>), and any archaeological guidance issued by the SHPO.